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TRILOBITA

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COMPILED BY

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II.—SUBJECT INDEX

GENERAL LITERATURE AND HISTORY

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Ventral sutures. — In *Redlichia noetlingi* there are connective sutures across the doublure, but neither a hypostomal suture nor a rostral suture, Schindewolf; Conjoined free cheeks described in *Parabolina*, suggesting fusion of ventral suture (or sutures), Sdzuy.

Cephalic spines. — General review of occurrence of marginal spines in larval and adult forms, and of their interpretation by various authors; the spines (often three pairs) of larval forms are probably adaptations to a pelagic habit, their disposition relative to the cephalon as a whole is purely functional, they bear no specific relation to individual segments, and they are not necessarily homologous in different forms (e.g. the 3 pairs in *Leptoplastus*, *Acanthoparypha* & *Olenelloides*), Kielan; Strong paired anterior "horns" on cranium of *Diceratocephalus* interpreted as procranial spines, Lu.

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Hypostome.—In *Redlichia noetlingi* the hypostome is fused to the cephalic doublure (there is no hypostomal suture); a flat crescentic plate between the central body of the hypostome and the doublure is interpreted as the hypostomal wing (rather than as an ankylosed rostral plate), Schindewolf.

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Extinction. — Neither extrinsic causes (e.g. changes in environment) nor intrinsic causes (phylogerontism) satisfactorily explain the extinction of the Phacopidae at the end of the Devonian, R. & E. Richter (1).

Phylogerontism. — Development of proparian facial sutures in late Olenidae so attributed, Kobayashi (1); Considered not a satisfactory explanation of the extinction of the

Phacopidae since there is no morphological evidence of degeneration in the Upper Devonian forms, and since both long-established [*Phacops* (*Phacops*)] and newly-developed [*P.* (*Cryphops?*) & *P.* (*Dianops*)] stocks are affected, R. & E. Richter (1).

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Homeomorphy. — Glabellas of *Drevermannia* (*Eodrevermannia*) and *Calymene*, Fribyl & Plas.

Biometry. — Measurements used to distinguish 2 spp. of *Aphelaspis*, linear relative growth relations plotted, Palmer (1); Regression lines calculated for two pairs of characters in *Geragnostus*, Palmer (2).

Classification (principles of). — Among Upper Cambrian Agnostidae from Nevada the outline of the axial lobe of the pygidium is considered more stable (and therefore more suitable for the discrimination of subfamilies) than other characters such as the relative development of the dorsal furrows, Palmer (2).

Classification.—Hupé (4); Classification adopted into (i) Polymera, including Redlichida, Corynexochida, Dikelocephalida, Conocoryphida, Burlingida, and (ii) Miomera, including Eodiscida and Agnostida, Kobayashi (1); Calymenidae taken to include *Pharostoma* and family considered fundamentally opisthoparian; close relations postulated between Remopleuridae & Richardsonellidae, and between Ceratopygidae & Asaphidae, Sdzuy; Of Ceratopygidae, which are considered related to Asaphidae or Taihungshaniinae, Kobayashi & Ichikawa; Crepicephalidae considered an unnatural assemblage, its members being redistributed into 2 new families Coosellidae & Tricrepicephalidae, Palmer (1).

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(postulated) swimming and floating life grazing on sea-meadows, **Kobayashi** (1); In Middle and Upper Ordovician limestones of Sweden the proportion of arthropods (trilobites and ostracods) among the shell fragments shows an inverse correlation ($r = -0.83$) with the percentage of insoluble residue, **Martna**; Lumachelles made up of remains of a single species (e.g. of *Scutellum paliferum* in Lower Devonian limestones in Bohemia) interpreted as accumulations of moult-fragments, **Chlupáč** (2).

Migration. — General discussion of Lower Ordovician faunas and correlation; *Parabolinella*, *Peltura* and *Telephus* recorded from British Columbia, **Kobayashi** (1); L. & M. Devonian faunas of Sahara contain elements from Europe, N. America (e.g. *Coronura aspectans*), and Bolivia, **Le Maître** (2); Scandinavian genus *Proceratopyge* in *Chuangia* fauna of Manchuria, **Kobayashi & Ichikawa**; *Lotagnostus* recorded for the first time from western N. America, **Palmer** (2); German genus *Mephiarges* from Middle Devonian of Australia, **Edgell**; In Nevada a fauna with elements similar to the *Hungaia magnifica* fauna of Quebec is assigned to the Franconian, **Palmer** (2).

Teratology. — Damaged brim in *Harpes*, **Prantl** (1).

DISTRIBUTION AND FAUNAS

Cambrian. — China (Shan-tung), **Kobayashi** (2); Manchuria, **Endo** (1), (2); Manchuria, China (Shan-tung), **Hupé** (4); Persia, **King**; Spain (Castilla la Vieja), **Sampelayo**.

Cambrian (Lower). — Canada (Quebec [in boulders], British Columbia), U.S.A. (Vermont), **Rasetti**; Greenland (Ella I.), **Poulsen & Rasmussen**; Pakistan (Salt Range), **Schinidewolf**; Spitzbergen, **Winsnes**; U.S.A. (Vermont), **Shaw** (2); U.S.S.R. (Siberia), **Lermontova** (1); U.S.S.R. (Siberia), **Zelenov**, **Zhuravleva & Korde**.

Cambrian (Lower & Middle). — Morocco (Anti-Atlas), **Hupé** (3).

Cambrian (Middle). — Argentina, **Rusconi** (1); Bohemia, **Howell** (2); Czechoslovakia, **Havlíček & Šnajdr**; France (Aude), **Astre**; Norway (Oslo), **Spjeldnaes**; U.S.A. (California), **Stoyanow & Susuki**; U.S.S.R. (Kazakhstan), **Lermontova** (1); U.S.S.R. (Turkestan), **Lermontova** (2).

Cambrian (Middle & Upper). — Argentina (Mendoza), **Rusconi** (3), (4), (5); U.S.A. (Montana), **McMannis**; U.S.A. (Wyoming), **Durkee**.

Cambrian (Upper). — Argentina (Mendoza), **Rusconi** (2); China (Inner Mongolia), Manchuria, **Lu**; Manchuria (Liaotung), **Kobayashi & Ichikawa**; Persia, China (Yun-nan), U.S.A., **Hupé** (4); Sweden, **Lindström**; Sweden (Nerike), **Tjernvik**; U.S.A. (Montana & Idaho), **Scholten et al.**; U.S.A. (Nevada), **Palmer** (2); U.S.A. (N. Mexico), **Kelley & Silver**, **Flower**; U.S.A. (Texas), **Cloud & Barnes**, **Palmer** (1), **Wilson** (1), (2); U.S.A. (Vermont), **Gilman**; U.S.A. (Wyoming), **Okulitch & Bell**, **DeLand**; U.S.S.R. (Kazakhstan & Siberia), **Lermontova** (3).

Ordovician. — Argentina (Mendoza), **Rusconi** (2), (4); Britain (Shropshire, Wales, Scotland), Bohemia, Peru, **Whittard**; Czechoslovakia, **Havlíček & Šnajdr**; France (Maine-et-Loire), **Dupuis**; Greenland (Ella I.), **Poulsen & Rasmussen**; Scandinavia, **Skjeseth**; Spain (Badajoz), **Linares Rodríguez**; U.S.A. (Texas), **Wilson** (2).

Ordovician (Tremadoc). — Britain (W. England), **Curtis**; China (Tien-Shan), France (Hérault), **Hupé** (4); Germany (Hof in Bavaria), **Sdzuy**; Morocco (Anti-Atlas), **Choubert**, **Hindermann & Hupé**; Sweden, **Tjernvik**; U.S.A. (Vermont), **Shaw** (1).

Ordovician (Lower). — Argentina (Mendoza), **Rusconi** (5); Germany, **Hundt**; Manchuria, **Endo** (1), (2); Sweden, **Lindström**; Sweden (Dalar-na), **Jaanusson & Mutvei**; Sweden (Öland), **Bohlin**; U.S.A. (Idaho), **Hupé** (4); U.S.A. (N. Mexico), **Flower**; U.S.A. (Texas & Colo.), **Cloud & Barnes**; U.S.A. (Utah), **Hintze** (1); U.S.A. (Wyoming), **Durkee**.

Ordovician (Lower & Middle).—Canada (British Columbia), Argentina, Kobayashi (1); U.S.A. (Utah & Nevada), Hintze (2).

Ordovician (Middle).—Britain (N. Wales), Whittington (2); Canada (Ontario), Whittington (1); Canada (Quebec), Clark & Strachan; France (Maine-et-Loire), Péneau (2); Norway (Oslo-Asker), Hagemann & Spjeldnaes; Scandinavia, Jaanusson & Strachan; U.S.A. (Minnesota), Weiss; U.S.A. (Missouri), Howell (1); U.S.A. (New York), Evitt.

Ordovician (Middle & Upper).—Canada (Manitoba), Baillie; Sweden, Martna.

Ordovician (? Upper).—Canada (Baffin I.), Whittington (1).

Ordovician (Upper).—Britain (Scotland), Hupé (4); Canada (Baffin I.), Fortier; Czechoslovakia (Bohemia), Röhlich & Chlupáč, Marek (1), (2); Poland (Lysa Gora), Kielan; U.S.A. (Iowa), Tasch.

Silurian.—Australia (N.S.W.), Crook; Britain (W. England), Curtis, Lawson; Czechoslovakia (Bohemia), Svoboda & Prantl (1).

Silurian (Lower).—U.S.A. (N.Y.) and Canada (Ontario), Fisher.

Silurian (Upper).—Britain (Wales), Straw; Czechoslovakia, Bouček & Přibyl, Chlupáč (1), (2), Horný, Růžička & Bouška, Svoboda & Prantl (2), (4); French West Africa (Adrar), Le Maître (3).

Devonian.—Czechoslovakia, Svoboda & Prantl (1), (3), (4).

Devonian (Lower).—Czechoslovakia, Chlupáč (2), Prantl (1), Svoboda & Prantl (2); France (Anjou), Fillet (2); France (Maine-et-Loire), Fillet (1); U.S.A. (New York), Ruedemann.

Devonian (Lower & Middle).—Germany (Rhineland), Krömmelbein et al.; Sahara, Le Maitre (2).

Devonian (Middle).—Australia (N.S.W.), Edgell; Czechoslovakia (Bohemia), Přibyl & Plas; Germany (Rhineland), Glinski, Struve; Sahara, Le Maitre (1); U.S.A. (New York), Kindle & Eidman.

Devonian (Upper).—Britain (W. England), Goldring; Germany, Rabien, R. & E. Richter (1); U.S.A. (Montana & Idaho), Scholten et al.

Carboniferous.—Czechoslovakia, Přibyl; U.S.A. (Wyoming), Shaw & Bell.

Carboniferous (Lower).—Britain (Wales), Owen & Jones; Britain (W. England), U.S.S.R., Goldring; Eire (Sligo etc.), Oswald; Spain (Asturias), Linares Rodriguez; U.S.A. (N. Mexico), Kelley & Silver; U.S.A. (Ohio), Hyde; U.S.A. (Oklahoma), Huffman; U.S.S.R. (Urals), Einor.

Carboniferous (Upper).—U.S.A. (Nevada), Dott.

Permian.—Bohemia, R. & E. Richter (3).

Revision of horizon.—Fauna from U.S.A. (Vermont) described by Shaw 1951 [recorded Z.R. 88 11 title 61] as Upper Cambrian now considered to be Ordovician (Tremadoc) in age, Shaw (1).

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Acanthaloma lochkovensis Ptl & Přib., A. sp. p. 314, Chlupáč (1).

Acanthaloma lochkovensis Ptl & Přib. p. 212, A. (*Kettneraspis*) *pigra* (Barr.) p. 219, Svoboda & Prantl (1).

Acanthaloma lochkovensis Prantl & Přibyl p. 385, A. *hoernesii* (Barr.) p. 388, A. (*Kettneraspis*) *dereicta* (B.) p. 389, Svoboda & Prantl (2).

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Acanthopyge haueri (Barr.) p. 438, Svoboda & Frantl (3).

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Acaste sp. (*nolens* group) p. 22, Krömmelbein et al.

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Acrocephalites ? vulcanus of Walcott 1916 pl. 26 fig. 2 referred to *Periomma typicalis* p. 797, Shaw (2).

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Agnostinae (McCoy 1849)—*Geragnostus* Howell 1935 referred, hence Geragnostidae a synonym p. 14, Sdzuý.

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Agnostus calvus listed p. 5, Curtis.

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Agnostus hoiformis Kobayashi p. 109, *A. douvillei* Bergeron, *A. damesi* Resser & Endo p. 110, Endo (2).

Agnostus koerferi Monke 1903 a synonym of *Pseudagnostus douvillei* (Bergeron 1899), *A. pii* Airaghi 1902 probably also a synonym p. 90, Kobayashi (2).

Agnostus laevigatus records of Brögger 1882 discussed pp. 111, 115, Spjeldnaes.

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"*Agnostus*" *nordicus* Lochman and synonym "*A.*" *valentinus* L. referred to *Pseudagnostus* ? [quod vide] p. 721, Palmer (1).

Agnostus tumidosus Hall & Whitfield referred to *Geragnostus* [quod vide] not to *Homagnostus* p. 89, *A. communis* H. & W. with synonym *A. neon* H. & W. to *Pseudagnostus* p. 94, *A. prolongus* H. & W. also to *P.* p. 98, Palmer (2).

Agrauloidae — *Micragraulidae* referred p. 94, **Hupé** (4).

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Aguaraya gen. n. [Oryctocephalidae], *A. acutispina* sp. n. p. [2] text-fig. 2 Cambrian (Middle) Argentina, Rusconi Bol. paleont. B. Aires No. 29 1954.

Aguaraya acutispina Rusc. p. 62 pl. i fig. 2, **Rusconi** (5).

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Alceste hisingeri (Barr.) p. 9, Röhlich & Chlupáč.

Altonia Lermontova 1940 discussed, *A. ornata* L. refigured p. 144 pl. xviii figs. 5, 5a-e, **Lermontova** (1).

Alokistocare? *asiatica* sp. n. p. 19 pl. ii fig. 10 Cambrian (Middle) U.S.S.R. (Turkestan), Lermontova Middle Cambrian trilobites and gastropods from Shody-Mira, 1951.

Amecephalus cormoranus sp. n. p. 4 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Amecephalus cormoranus Ruse. illustrated p. 23 pl. i fig. 7, *A. mendozanus* R. p. 8, **Rusconi** (5).

Amechilus Ross 1951 discussed and referred to Emmerichellidae [sic], *A. tuberculatus* sp. n. Ordovician (Lower) Canada (B.C.) p. 459 pl. vi fig. 11, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Ameura Weller 1936 referred to Phillipsiinae p. 409, Přibyl.

Amphytrion see *Amphytrion*.

Amphytrion radians (Barr.) pp. 9, 10, **Röhlich & Chlupáč**.

Amphoton deois (Walcott) recorded — following considered synonyms *Bathyuriscus asiaticus* Lorenz, *A. steinmanni* L., *A. parallela*, *A. alia* & *A. divergens* Resser & Endo 1937 spp. p. 60; *A. sp.* listed p. 15, Endo (1).

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Amphytrion [sic] *radians* (Barr.) p. 237, Marek (1).

Ampyx Dalman 1827 referred to Raphiophorinae p. 261, **Hupé** (4).

Ampyx nasutus Dalm. p. 128, *A. cf. n.* p. 116, Eohlin.

Ampyx salteri Hicks syntype figured p. 15 pl. i figs. 15-21, *A. linleyensis* sp. n. Ordovician (Middle) Britain (Shropshire) for *A. s.* of La Touche 1884 and *A. mammillatus austini* of Whittard 1940 p. 18 pl. ii figs. 1-8; *A. nudus* (Murchison) [does not occur in Shropshire p. 20] type of *Cnemidopyge* gen. n. p. 21 to which are referred *A. bisectus* Elles and provisionally *A. costatus* Boeck [discussed p. 18]; *A. domatus* referred tentatively to *Lonchodus*, records of Greenly 1919 & Fearnside 1905 excluded p. 17; *A. aldonensis* Reed and *A. acus* Troedsson referred to *Ampyxina* p. 25; *A. austini* Portlock lectotype lost p. 20n, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Ampyx walcotti sp. n. p. 469 pl. viii figs. 1a-b, 2a-b, 3, *A. walcotti* var. *stenorachis* var. n. p. 470 pl. viii figs. 4a-b, 5, *A. a* sp. nov. p. 470 pl. viii figs. 21-23, *A. b* sp. nov. p. 471 pl. viii figs. 18-20 Ordovician (Lower & Middle) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Ampyx ind. sp. p. 421 pl. xl fig. 97, Whittington (2).

Ampyx n. sp. [undescr.] aff. *costatus* (Boeck) p. 11, JAANUSSON in JAANUSSON & MUTVEI.

Ampyxina Ulrich 1922 referred to Raphiophoridae (Ampyxininae) subfam. n. p. 261, Hupé (4).

Ampyxina wothertonensis sp. n. Ordovician (Middle) Britain (Shropshire) p. 24 pl. iii figs. 1-4; *A. aldonensis* (Reed), *A. pygmaea* (R.) & *A. acus* (Troedsson) so referred p. 25, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Ampyxininae subfam. n. [Raphiophoridae] p. 261 for *Ampyxina* and *Raymondella*, Hupé Ann. Paléont. 41 1955.

Anabaraspis gen. n. [Protolenidae] p. 91 for type *A. splendens* sp. n. p. 92 pl. xiii figs. 1, 1a-g, *A. cylindricus* [cylindricum on p. 172] sp. n. p. 93 pl. xiii fig. 2 Cambrian (Lower) U.S.S.R. (Siberia), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Anacheirurus Reed 1896 referred to Pilekiidae fam. n. p. 42, Sdzuy.

Anataphrus gen. n. [Asaphidae] p. 141 for type *A. borraeus* sp. n. Ordovician (? Upper) Canada (Baffin I.) p. 142 pl. lxiii figs. 1-5; following spp. referred to *A.-gigas* Raymond 1920, *vigilans* Meek & Worthen 1870, *raymondi* Troedsson 1928, Whittington Mem. geol. Soc. Amer. No. 62 1954.

Anchiopsis anchiops (Hall), *A. anchiops* var. *sobrinus* (H.) p. 184, Kindle & Eidman.

Anisopyge Girty 1908 referred to Phillipsiinae p. 409, Fribyl.

Anisopyginae Hupé 1953 a synonym of Phillipsiinae p. 409, Fribyl.

Ankoura Resser 1938 referred to Kingstoniinae, *A. cf. A. apicalis* Duncan [cranidium described] p. 724 pl. lxxix figs. 10-11, Palmer (1).

Ankoura guatana sp. n. p. 4 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Ankoura guatana Rusconi, illustrated p. 38 pl. iii fig. 6, Rusconi (5).

Anomocare alcione Walcott 1913 type of *Psilaspis* (*Entorachis*) subgen. n. p. 94, Kobayashi (2).

Anomocare sp. 1 (sp. nov.) p. 13 pl. iii figs. 1-5, *A.?* sp. 2 p. 15 pl. iii figs. 6-8 Cambrian (Middle) U.S.S.R. (Turkestan), Lermontova (2).

Anomocarella deflecta Endo, *A. orientalis* E., *A. tumida* E. p. 110, Endo (2).

Anomocarella distincta Resser & Endo—following R. & E. 1937 spp. of *A.* considered synonyms *walcotti*, *rara*, *blackwelderi*, *truncata* p. 84; *A. deflecta* sp. n. p. 85 pl. ii figs. 16-20, *A. puteata* sp. n. p. 85 pl. iii fig. 1, *A. tumida* sp. n. p. 86 pl. ii figs. 10-15 Cambrian (Middle) Manchuria; *A. macar* Walcott a synonym of *Manchuriella subquadrata* (Dames) p. 87, *A. temenus* W. referred to *Manchuriella* [quod vide] p. 87; *A. elongata* R. & E. p. 11, *A. orientalis* E. p. 21, *A. cfr. o.* p. 38, *A. huoliensis* E. p. 40, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Anomocarellidae — *Kotzia* Kobayashi tentatively referred p. 100, Hupé (4).

Anomocaridae Poulsen 1927 discussed, resemblances to Dikelocephalidae may indicate convergence not affinity, classified into Anomocarinae, Paracoosiinae, Dikelocephaliniae & Hunguiinae p. 36, Sdzuy.

Anomocarinae (Poulsen 1927) discussed and taken to include *Anomocare*, *Lioparia*, *Anomocarina* & *Anomocariooides* p. 37, Sdzuy.

Antagmina Hupé 1953 discussed & considered a subfamily of Ptychopariidae to include the Lower Cambrian forms *Antagmus*, *Austinvillia*, *Bicella* gen. n., *Crassifimbra*, *Eoptychoparia* gen. n., *Luxella* gen. n., *Onchocephalus*, *Periomma*, *Piazella*, *Poulsonia*, *Proliostracus*, *Sombrero*, *Syspacephalus*, and possibly the Middle Cambrian *Arellanella*, *Caborella* etc. p. 9, Rasetti.

Antagmina genus and species undetermined p. 27 pl. vi figs. 16-18 Cambrian (Lower) Canada (Quebec) [in boulders], Rasetti.

Antagmus Resser 1936 discussed pp. 5, 9, *A. gigas* sp. n. p. 10 pl. i fig. 1 (drawing), pl. ii figs. 1-8, *A. elongatus* sp. n. p. 11 pl. ii figs. 11-16, *A. ? longifrons* sp. n. age less certain p. 12 pl. vi figs. 12-15 Cambrian (Lower) Canada (Quebec) [in boulders]; *A. solitarius* Lochman referred to *Onchocephalus* p. 16, Rasetti Smithson. misc. Coll. 128 7 1955.

Antagmus discussed p. 778, *A. simplex* Resser 1937 and *A. typicalis* R. p. 776, Shaw (2).

Antatlasia recorded p. 972, Hupé (3).

Aojia spinosa Resser & Endo 1937 [so dated] with synonyms *A. pechiliensis* restr., *A. luna* & *A. yentaiensis* R. & E. spp.; *A. crassa* & *A. fracta* R. & E. names "withdrawn" [considered nomina dubia]; *A. reflexa* sp. n. including in synonymy *A. pechiliensis* R. & E. 1937 partim (pl. 47 fig. 34) and *Proasaphiscus* sp. R. & E. p. 64 pl. ii figs. 6-9, *A. angustata* sp. n. p. 65 pl. i figs. 9-12, *A. divergens* sp. n. p. 65 pl. ii fig. 5, *A. tumida* R. & E. p. 65 pl. i figs. 15-16, pl. ii figs. 1-4, *A. ? triangulata* sp. n. p. 66 pl. viii fig. 1 Cambrian (Middle) Manchuria, *A. depressa* Endo p. 11, *A. ? punctata* R. & E. p. 20, *A. quadrata* R. & E. p. 22, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Aojia spinosa Resser & Endo p. 110, Endo (2).

Apatocephalus Brögger 1896 referred to Richardsonellidae, *A. asarkus* sp. n. p. 25 pl. v figs. 22-24, ?25, text-figs. 21-23 Ordovician (Tremadoc) Germany (Hof), Sdzu Abh. senckenb. naturf. Ges. No. 492 1955.

Apatocephalus canadensis Kobayashi p. 414 pl. ii fig. 2, Kobayashi (1).

Aphelaspis Resser 1935 discussed p. 743, *A. constricta* sp. n. p. 745 pl. lxxxiv fig. 11, *A. longifrons* sp. n. p. 745 pl. lxxxiv figs. 9, 12, pl. lxxxv figs. 2, 3, *A. spinosa* [spinosus on p. 780] sp. n. p. 746 pl. lxxxiv fig. 10 Cambrian (Upper) U.S.A. (Texas), *A. walcotti* Resser [differences from *A. spinosa* may be sexual] with synonyms *A. depressa* Bridge (non

Shumard) and *A. hamblenensis* R. p. 746 pl. lxxxiv figs. 2, 4-8; *A. quadrata* R. with synonym *A. laxa* R. referred to *Labiostria* gen. n., *A. camiro* (Walcott) [possibly a new gen.] and *A. wyomingensis* (Miller) excluded from *Aphelaspis* p. 744, Palmer J. Paleont. 28 6 1955.

Arapahoria sp. p. 1394, McMannis.

Arcuolimbus gen. n. [Llanoaspidae] for type *A. convexus* sp. n. Cambrian (Upper) U.S.A. (Texas) p. 735 pl. lxxxiii figs. 1, 2, 4, Palmer J. Paleont. 28 6 1955.

Arellanella may belong to Antagminaе p. 9, Rasetti.

Aristoharpes ? *rotundus* sp. n. p. 129 pl. iii figs. 5-7 Ordovician (Lower) Sweden (Öland), Bohlin Bull. geol. Instn Univ. Upsala 35 1955.

Asaphellus Callaway 1877—*Hemigyraspis* [Raymond 1910] a synonym p. 436, *A. ? canadensis* sp. n. Ordovician (Lower) Canada (B.C.) p. 438 pl. v figs. 1-3, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Asaphellus nearly identical with *A. homphrayi* [sic] Salter recorded from Tremadoc of Morocco p. 1593, Choubert, Hindermeyer & Hupé.

Asaphellus orientalis Endo p. 108, Endo (2).

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Asaphidae Burmeister 1843 discussed, *Sympysurininae* subfam. n. [quod vide] p. 426, Kobayashi (1).

Asaphidae considered related to Ceratopygidae p. 21, Sdzu.

Asaphidae — Macropyginiae referred p. 201, Hupé (4).

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Asaphiscidae Raymond 1924 — Shaw's 1952 classification used p. 721, Palmer (1).

Asaphiscidae classified into Asaphiscinae and Lecanopleurinae subfam. n. [quae vide] p. 136, Hupé (4).

Asaphiscidae considered not closely related to Ceratopygidae p. 21, Sdzy.

Asaphiscidae — *Hyperbolochilus* referred p. 422, Kobayashi (1).

Asaphiscinae nov. as a subfamily of Asaphiscidae for *Proasaphiscus*, *Asaphiscus*, *Blainia*, *Modocia*, *Wilbernia* and *Dunderbergia* p. 136, Hupé (4).

Asaphiscus kobayashii Resser & Endo a synonym of *A. bassleri* R. & E. p. 84; *A. walcotti* R. & E. listed p. 24, *A. tsutsumii* E. p. 34, *A. peiensis* R. & E. p. 36, Endo (1).

Asaphiscus walcotti Resser & Endo p. 110, Endo (2).

Asaphoidae — reference of Remopleurididae suggested tentatively p. 701n, Hupé (1).

Asaphopsis Mansuy recorded from Tremadoc of Morocco p. 1593, Choubert, Hindermeyer & Hupé.

Asaphopoides gen. n. [nom. nud. 1953] [Hungaidae (Dikelokephalini-nae)] p. 173 for type *Diceliocephalus? villebruni* Bergeron text-fig. 167 (3) Tremadoc France (Hérault), Hupé Ann. Paléont. 41 1955.

Asaphus cornutus Pand. illustrations of Panderian organs pl. xxix figs. A, B, pl. xxx fig. 1, text-figs. 1c, 4 b-c, 6 b, 7 c, 8 b, *A. lepidurus* Nieszk. text-fig. 2c, Hupé (1).

"*Asaphus*" cf. *A. curiosus* Billings p. 362, Cloud & Barnes.

Asaphus limbatus Rusconi 1946, *A. ? inexcavatus* R. 1946, *A. ? asperoensis* R. 1952, *A. ? acequionensis* R. 1954: all referred to *Glossopleura* p. [2], Rusconi (1).

Asaphus ludibundus Törnquist p. 237, Martna.

Asaphus (Neoasaphus) platyurus platyurus Ang. p. 11 ff. text-fig. 2, *A. (N.)* p. [s.l.] p. 12 ff., *A. (N.) demissus* Törnq. p. 11, *A. (N.)* sp. p. 15 ff., JAANUSSON in Jaanusson & Mutvei.

Asaphus "raniceps" p. 115, *A. sp.* p. 116, *A. (Neoasaphus) sulevi* cf. knyrkoi Fr. Schmidt [det. Jaanusson] p. 138 pl. iv fig. 5, Bohlin.

Asaphus wirthi Barrande 1868 (figs. 22-26, ? figs. 27-28) a synonym of *Niobe (Niobella) innotata* (B. 1868) p. 22, Sdzy.

Asaphus sp. p. 81, Hundt.

Astroptychaspis ceto (Walcott) p. 19, *A. asiatica* (Resser & Endo) p. 32, Endo (1).

Asteropyge Upper Devonian forms discussed p. 70 text-fig. 2, *A. (A.) lobispina* nom. nud. p. 70, R. & E. Richter (1).

Asteropyge (*Asteropyge*) *jonesi* (Oehlert), *A. (A.) michelini* (Rouault), *A. (A.) munieri* (O.), *A. (Metacanthus) barrandei* (O.) listed pp. 16-17, *A. (M.) andegavensis* (Pillet) p. 21, *A. sp.* p. 22, Pillet (2).

Asteropyge ostiolati n. sp. [nom. nud.] p. 313, R. & E. RICHTER in Struve.

Asteropyge pectinata Roemer p. 151 pl. xxi fig. 13, *A.* group *michelini* Rouault p. 152 pl. xxi figs. 11-12, *A. mesocrystata* sp. n. Devonian (Middle) Algeria (Sahara) p. 153 pl. xx figs. 24-26, *A. (Comura)* sp. p. 154 pl. xxi fig. 17, Le Maître Matér. Carte géol. Algér. [1] No. 12 1952.

Asteropyge sp. p. 19, Krömmelbein et al.

Astyctoryphe gracilis (Barr.) p. 154, Chlupáč (2).

Astyctoryphe gracilis (Barr.) p. 387, Svoboda & Prantl (2).

Atops trilineata Emmons probably not found in N.W. Vermont p. 777, Shaw (2).

Atractopyge Hawle & Corda referred to Encrinurinae p. 253, Hupé (4).

Atractopyge ind. sp. for *Cybele verrucosa* & *C. rugosa* [partim] of Elles 1922 (p. 145) p. 423 pl. xl figs. 106, 109-110, Whittington (2).

Aulacopleura (*A.*) *koninkii haueri* (Frech) p. 208, *A. (Paraulacopleura) [sic] inexpectata* (Barr.) p. 225, Svoboda & Prantl (1).

Aulacopleura (*Aulacopleura*) *konincki* (*konincki*) (Barr.) p. 379, *A.* (*A.*) sp. p. 376, *A.* (*A.*) *nitida* (B.) p. 381, Horný.

Aulacopleura (*Aulacopleura*) *nitida* (Barr.) p. 582, Bouček & Fříbyl.

Austinvillia Resser 1938 discussed and referred to Antagminae pp. 6, 22, *A. virginica* R. from Quebec p. 23 pl. i fig. 5 (drawing), pl. iv figs. 8–10, *A.* sp. [close to *A. v.*] from Vermont; *A. bicensis* R. type of *Bicella* gen. n. p. 26, Rasetti.

Austinvillia billingsi sp. n. for *A.* n. sp. Shaw 1954 Cambrian (Lower) U.S.A. (Vermont) p. 777 pl. lxxiii figs. 1–4, Shaw J. Paleont. 29 5 1955.

Bailiella levyi Mun.-Ch. et Berg. p. 113, Astre.

Bailiella ulrichi Resser & Endo p. 23, *B.* sp. p. 42, Endo (1).

Bailiella ulrichi Resser & Endo p. 110, Endo (2).

Bailiella ulrichi Resser & Endo type of *Tangshihella* gen. n. p. 111, Hupé (4).

Bailiellinae see *Tangshihella* gen. n.

Baltagnostus Lochman 1944 referred to Peronopsinae, *B.* cf. *B. centerensis* (Resser) pl. lxxvi figs. 13–14; *B. centerensis* (R.) and *B. maryvillensis* (R.) may be conspecific, *B. beltensis* L. holotype pygidium belongs to *Kormagnostus* [quod vide] p. 718, Palmer (1).

Basidechenella see *Dechenella*.

Basilicella wusungensis sp. n. p. 94 pl. ix figs. 10–12, pl. x figs. 1–7, *B. chinkoutzuensis* [*chingkoutzuensis* on pl. expl.] sp. n. p. 94 pl. x figs. 8–9 Ordovician (Lower) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Bathynotus Hall 1860 discussed p. 96, *B. namanensis* Lermontova refigured p. 97 pl. xvi figs. 5, 5a-d, Lermontova (1).

Bathynotus holopygus (Hall) 1859 p. 778, *B. h?* pl. lxxiii fig. 5, Shaw (2).

Bathyurellus glensaulensis Reed affinities with *Hyperbolochilus* discussed p. 423, Kobayashi (1).

Bathyurellus sp. p. 293, Cloud & Barnes.

Bathyuridae—see *Gonioteloides* gen. n., *Licnocephala*, *Lachnostoma*.

Bathyurids (several undescribed types) p. 21, Poulsen & Rasmussen.

Bathyuriscellus gen. n. [Corynexochidae] p. 102 for type *B. robustus* sp. n. p. 103 pl. xiv figs. 2, 2a, ? *B. robustus* p. 104 pl. xiv figs. 3, 4 Cambrian (Lower) U.S.S.R. (Yakutsk), *B. grandis* sp. nov. [nom. nud.] p. 157, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Bathyuriscidella palauquiana sp. n. p. 4 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Bathyuriscidella palauquiana Rusconi illustrated p. 23 pl. i fig. 16, Rusconi (5).

Bathyuriscus asiaticus Lorenz a synonym of *Amphoton deois* (Walcott) p. 60, Endo (1).

Battus nudus Beyrich 1845 type of *Phalagnostus* gen. n. since it is debatable whether it can be considered type of *Phalacroma* Hawle & Corda, *P. scutiforme* H. & C. a synonym p. 925, Howell (2).

Bavarilla Barrande 1868 discussed and referred to Calymenidae p. 34, *B. hofensis* (B. 1868) neotype with synonyms *Conocephalites* ? münsteri, *C. quaeusitus* & *Calymene tristani* var. *bavarica* B. 1868 spp. p. 35 pl. vi figs. 44–61 text-fig. 34 (reconstruction), Prantl & Růžička's 1941 record of *B. h.* may be different p. 36, Sdžuy.

Bellefontia Ulrich 1924 referred to Ogygiocarinae and discussed p. 436, *B. platana* sp. n. p. 436 pl. iii figs. 2–5, *B.?* aff. *collieana* (Raymond) p. 437 pl. v figs. 4–5, *B.?* sp. p. 437 pl. v fig. 6 Ordovician (Lower) Canada (B.C.), *Sympysurina walcotti* Kindle 1929 may belong to *B.* p. 373, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Bellefontia recorded p. 2055, Flower.

Bellefontia n. sp. a [undescr.] p. 12, Hintze (1).

Bellefontia-like n. gen. [undescri.]
n. sp. a [undescri.] p. 12, Hintze (1).

Beltella depressa listed p. 5, Curtis.

Bergamia gen. n. [Trinucleidae] p. 31 for type *B. rhodesi* sp. n. Ordovician (Lower) Britain (Shropshire) p. 32 pl. iii figs. 8-13, *B. gibbsi* (Salter) p. 34 pl. iv figs. 1-2, *B.? sedgwicki* (S.) syntype figured p. 34 pl. iv figs. 3-4, *B.? etheridgei* (Hicks) lectotype chosen & figured p. 34 pl. iv figs. 5-6 [sp. may be better considered nom. dubium p. 35], "Trinucleus" *hibernicus* Reed also referred tentatively to *B.* p. 35, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Bergeroniaspis gen. n. [Protolenidae] for type *B. kutorginorum* sp. n. p. 79 pl. xii figs. 1, 1a, *B. ornatus* sp. n. p. 81 pl. xii figs. 2, 2a, *B. divergens* Lermontova for *Bergeroniellus* d. L. 1940 refigured p. 83 pl. xii fig. 3 Cambrian (Lower) U.S.S.R. (Yakutsk), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Bergeroniellus Lermontova 1940 referred to Protolenidae, *B. asiaticus* L. restr. refigured p. 63 pl. ix figs. 1, 1a-d, ? 2, pl. x figs. 1, 1a-d, pl. xi figs. 1, 1a, ? 1b, *B.* sp. 1 (?*B. asiaticus*) for *B. a.* of L. 1940 partim (pl. 38 fig. 1e) p. 68 pl. ix fig. 3, *B. asiaticus* var. *expansus* var. n. p. 69 pl. xi fig. 3, *B.* sp. 2 p. 70 pl. xi fig. 3a, *B. spinosus* sp. n. p. 71 pl. x figs. 2, 2a-b, *B. brevoculus* sp. n. p. 73 pl. xi fig. 2, *B. atlassovi* sp. n. for *B. asiaticus* of L. 1940 partim (pl. 38 fig. 1j) p. 74 pl. xi figs. 4, 4a, *B.* sp. 3 (?*B. atlassovi*) for L. 1940 pl. 39 fig. 1b p. 75 pl. xi figs. 6-7, *B. flerovae* sp. n. p. 76 pl. xi fig. 5, *B.* sp. 4 (?*B. flerovae*) p. 77 pl. ix fig. 4, *B.? clavatus* sp. n. p. 78 pl. vii fig. 2, *B.* sp. indet. pl. xi fig. 8 Cambrian (Lower) U.S.S.R. (Yakutsk), *B. glabrus* sp. nov. [nom. nud.] p. 156; *B. divergens* L. 1940 referred to *Bergeroniaspis* gen. n. [quod vide] p. 83, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Bergeroniellus sp. table 1, Zelenov, Zhuravleva & Korde.

Bicella gen. n. [Ptychopariidae (Antagmina)] for type *Austinvillia bicensis* Resser 1938 p. 26 pl. i fig. 7 (drawing), pl. iv figs. 1-7 Cambrian (Lower) Canada (Québec) [in boulders], Rasetti Smithson. misc. Coll. 128 7 1955.

Billingsaspis Resser 1935 should be discarded as the type species is unidentifiable p. 5, Rasetti.

Billingsaspis Resser 1935 discussed p. 778, *B. adamsii* (Billings) 1861 for *Conocephalites a.* B. with synonyms *C. vulcanus* B. 1861 [original type of *B.*] and *Ptychoparella billingsi* & *vermontensis* Resser 1937 spp. p. 779 pl. lxxiii figs. 6-12, *B. walcotti* (R.) 1937 for *P. w.* R. with synonym *P. swantonensis* R. 1937 p. 781, Shaw (2).

Binodaspis gen. n. [Incertae sedis] p. 138 for type *B. spinosa* sp. n. p. 142 pl. xix figs. 5, 5a-b, *B.* sp. I p. 138 pl. xix figs. 2, 2a-b, *B.* sp. II p. 140 pl. xix fig. 3, *B.* ? sp. p. 141 pl. xix figs. 4, 4a Cambrian (Lower) U.S.S.R. (Yakutsk), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Blackwelderia longispina Resser & Endo, *B. ? cornuta* E., *B.? granosa* E., *B. paronai* (Airaghi) p. 10, *B. spectabilis* R. & E. p. 26, Endo (1).

Blackwelderia longispina Resser & Endo, *B. ? cornuta* E., *B. granosa* E. p. 109, *B. spectabilis* R. & E. p. 110, Endo (2).

Blackwelderia sinensis (Bergeron), *B. paronai* (Airaghi) p. 425 ff., *B.* sp. p. 426, *B.* cf. p. p. 428; *B. ? cornuta* Endo 1937 partim may belong to *Diceratocephalus* gen. n. p. 433, Lu.

Blackwelderia ex. sinensis (Bergeron) and *B. paronai* (Airaghi)—*Teinistion sodeni* Monke 1903 referred p. 93, *B. monkei* (Walcott) for *Stephanocare?* sp. M. 1903 p. 90, Kobayashi (2).

Blackwelderoides gen. n. [nom. nud. 1953] [Damesellinae] for type *Stephanocare? monkei* Walcott p. 146 text-fig. 144 (3) drawing Cambrian China (Shan-tung), Hupé Ann. Paléont. 41 1955.

Blandicephalus gen. n. [Ptychopariidae] p. 748 for type *B. texanus* sp. n. Cambrian (Upper) U.S.A. (Texas) p. 749 pl. lxxxv figs. 7-10, Palmer J. Paleont. 28 6 1955.

?*Blountia barranqueana* Rusc. illustrated p. 21 pl. i fig. 5, *B. cuyana* R. p. 36 pl. iii fig. 3, ?*B. pampeana* R. p. 37 pl. iii fig. 4, Rusconi (5).

Blountia cuyana sp. n. p. 3 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Blountia nixonensis Lochman including in synonymy *Maryvilia hybrida* Resser partim [cranium] p. 722 pl. lxxix fig. 4, *B. sp.* pl. lxxix fig. 12, Palmer (1).

?*Blountia pampeana* sp. n. p. 2 [unillustr.] Cambrian (Upper), ?*B. barranqueana* sp. n. p. 3 Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Blountina Lochman 1944 a synonym of *Protillaenus* Raymond 1937 p. 723, Palmer (1).

Boeckaspis gen. n. (nom. n. for *Boeckia* Brögger 1882 non Malm 1870) for type *Boeckia hirsuta* B. 1882 p. 161, Henningsmoen Norsk geol. Tidsskr. 35 1955.

Boeckia Brögger 1882 non Malm 1870 renamed *Boeckaspis* nom. n. p. 161, Henningsmoen.

Bolaspidella Resser 1937 discussed with diagnosis, following considered synonyms *Deltophthalmus* R. 1938, *Hysteropleura* Raymond 1937, *Deisella* Howell & Duncan 1939 and *Howellaspis* Lochman & Denson 1944 p. 739, *B. burnetensis* (Walcott) so referred rather than to *Cedaria* p. 740 pl. lxxxiii figs. 10, 12, 13, *B. prooculis* sp. n. Cambrian (Upper) U.S.A. (Texas) p. 740 pl. lxxxiii figs. 14-15, *B. wellsvillensis* (Lochman & Denson) with synonym *H. snowyensis* Duncan p. 741 pl. lxxxiii fig. 11, *B. sp.* p. 741 pl. lxxxiii fig. 9, Palmer J. Paleont. 28 6 1955.

Bolaspidella wellsvillensis (Lochman & Duncan) [sic] p. 1394, McMannis.

Bolbocephalus aff. *B. jeffersonensis* Cullison pl. xlvi fig. 24, *B. cf. B. j.* pl. xlvi fig. 25, Cloud & Barnes.

Bollandia Reed 1943 either a synonym of or a subgenus of *Griffithides* Portlock 1843 p. 411, Príbyl.

Bonneterrina Lochman 1936 referred to Cedariidae, *Piedmontia* Resser 1938 a synonym p. 725, *B. appalachia* (Walcott) for *Lonchcephalus* a. W. pl. lxxx fig. 9; *B. aspinosa* Tasch generic assignment questioned p. 726, Palmer (1).

Bonnia Walcott 1916 discussed p. 118, *B. inflata* Lerm. refigured p. 119 pl. xvii figs. 1, 1', 1a-d', Lemontova (1).

Bonnia brennoides, *B. laevigata*, *B. sculpta* Rasetti spp., *B. crassa*, *B. tensa* Resser spp., *B. brennus* (Walcott), *B. sp.* undet. listed p. 3, *B. fieldensis* (W.) p. 22, Rasetti.

Bonnia bubaris (Walcott) 1916 p. 781 pl. lxxiii figs. 13-14, *B. capito* (W.) 1916 with synonyms *B. lata*, *B. swantonensis*, *B. vermontensis* Resser 1936 spp. and *B. tensa* R. 1938 p. 781 pl. lxxiii figs. 15-25, *B. senecta* (Billings) record of W. 1912 from Vermont discussed p. 783, Shaw (2).

Bonnia sp. table 1, Zelenov, Zhuravleva & Korde.

Boniella desiderata (Walcott) 1891 p. 783, Shaw (2).

Borthaspis Stubblefield 1951 referred to Ogygiocarinae but may belong to Nileidae p. 196 n., Hupé (4).

Boschekulia gen. n. [Ceratopygidae], *B. lata* sp. n. p. 25 pl. iii fig. 13, *B. multisegmentata* sp. n. p. 26 [unillustr.], *B. sp.* p. 26 pl. iii fig. 14 [cranium—tentatively referred to *B. l.* pl. expl.] Cambrian (Upper) U.S.S.R. (Kazakhstan), Lemontova Upper Cambrian trilobites and brachiopods from Boshchekulia, 1951.

Bouleia Kozlowski 1923 referred to Phacopidae (Bouleinae) subfam. n. p. 238, Hupé (4).

Bouleia dagincourtii Ulrich opisthoparian (cedariiform) facial suture described, type specimen refigured pl. xxx figs. 2-4, text-fig. 1, Hupé (2).

Bouleinae subfam. n. [Phacopidae] for *Bouleia* p. 238, **Hupé** Ann. Paléont. **41** 1955.

Brachyaspispidon [sic] sp. p. 1394, **McMannis**.

Brachyaspis Salter 1866 may belong to Nileidae, *B. rectifrons* (Portlock 1843) discussed and existence of sagittal suture on cephalic doublure doubted p. 145, *B.? australis* sp. n. Ordovician (? Upper) Canada (Baffin I.) p. 143 pl. lxii figs. 21, 27, pl. lxiii figs. 6, 9, 10, 13, 14, **Whittington** Mem. geol. Soc. Amer. No. 62 1954.

Brachymetopina see *Brachymetopus*.

Brachymetopus see *Piltonia* gen. n.

Brachymetopus rusticus sp. n. p. 344 pl. liii figs. 1-6 Carboniferous (Lower) U.S.A. (Ohio), *B. lodiensis* (Meek) discussed p. 344, **Hyde Bull.** geol. Surv. Ohio No. 51 1953.

Brachymetopus (*Brachymetopina*) *woodwardi* Whidborne 1896 sens. nov. lectotype selected & figured, revised description p. 44 pl. ii figs. 14-15 text-figs. 7a, b, **Goldring**.

Brachymetopus? sp. p. 360, **Scholten et al.**

Brassicicephalus cf. *B. pulchellus* Lochman p. 757 pl. lxxxix fig. 3, **Palmer** (1).

Briscoia recorded p. 2055, **Flower**.

Broeggerolithus bureaui (Oehlert) so referred text-fig. 246, **Hupé** (4).

Brongniartella inexpectata (Barr.) p. 236 pl. i figs. 4-6, **Marek** (1).

Brongniartella inexpectata (Barr.) p. 8, **Marek** (2).

Bronteidae Corda 1847 a synonym of *Scutellidae* nom. n. [quod vide], **R. & E. Richter** (2).

Bronteopsis Nicholson & Etheridge 1879 discussed with diagnosis & referred to Styginidae pp. 11, 15, *B. concentrica* (Linnarsson 1869) for *Ogygia*? c. L. lectotype selected & figured with synonym *B. scotica* N. & E. p. 16 pl. v figs. 1-3, 5, text-fig. 1, *B. holtedahli* sp. n. Ordovician (Middle) Norway (Mjøsa) including *O. concentrica* of Funquist 1919 p. 17 pl. v figs. 4, 7, *B. panderi*

(Schmidt 1904) for *Ogygiocaris* p. S. [type of *Homoglossa* Raymond 1912] p. 19, *B.? törnquisti* for *Holometopus* t. Moberg & Segerberg 1906 p. 19; *B. ardmillanensis* Reed and *B. gregaria* Raymond referred to *Raymondaspis* p. 23, **Skjeseth** Norsk geol. Tidsskr. 35 1955.

Bulaiaspis predtechenskii sp. nov. [nom. nud.] p. 162, **Lermontova** (1).

Bumastoides subgen. n. see *Bumastus*.

Bumastus (*Bumastoides*) subgen. n. for type *Illaenus milleri* Billings 1859 Ordovician Canada (Ontario) holotype refigured p. 138 pl. lxii figs. 16-18, 20, 25, 26, 29, *B. (B.)* sp. ind. p. 140 pl. lxii figs. 22, 24; following spp. referred to *B. (Bumastoides)—bellevillensis*, *billingsi* Raymond & Narraway 1908 spp., *beckeri* Slocum 1913, *porrectus*, ? *aplatus*, ? *longiops* Raymond 1925 spp., *tenuirugosus* Troedsson 1928 p. 139; *Bumastus* sp. ind. Roy 1941 referred partim to *Anataphrus borraeus* gen. et sp. n. and partim to *Brachyaspis?* *australis* sp. n. p. 140, **Whittington** Mem. geol. Soc. Amer. No. 62 1954.

Bumastus billingsi Raymond & Narraway from Missouri p. 6 pl. i figs. 1-6, **Howell** (1).

Bumastus billingsi p. 765, *B.* sp. p. 763, **Weiss**.

Bumastus bouchardi (Barr.) p. 381, *B. bouchardi* (B.) n. var. [undescr.] p. 347ff., **Horný**.

Bumastus tenuirugosus Troedsson, *B.* sp. [near *B. fronto* T.], *B.* spp. A & B [undescr.] p. 154, **WILSON** in **Fortier**.

Bumastus trentonensis (Emmons) p. 36, **Baillie**.

Burlingida Kobayashi 1954 [not seen] as an order for *Burlingia*, *Schmalenseeia*, *Norwoodidae*, "and a few others" p. 411, **Kobayashi** (1).

Burlingiidae? see *Fisocephalus* gen. n.

Bynumia metisensis Rasetti see Genus and species undet. 1.

Calliops brevis (Roy 1941) restr. (fig. 131a—refigured) with synonym *Eomonorachus deloi* R. (refigured) p. 131 pl. lx figs. 5, 7, 8, 11, 14, 15, *C. brevis*? for Roy fig. 131b (refigured) p. 133 pl. lx figs. 9, 10, 12, 13, 16–18, Whittington (1).

Calodiscus agnostoides (Kobayashi 1943) p. 15 pl. ii fig. 1, *C. cf. a.* p. 16 pl. ii figs. 2–3, *C. sp. inc.* p. 16 pl. i figs. 14–15 from Spitzbergen, Winsnes.

Calvinella striata Resser & Endo p. 109, Endo (2).

Calvinella sp. p. 429, Lu.

Calybole see *Cyrtosymbole*.

Calymene Brongniart 1822 emend. Shirley 1936 referred to Calymeninae p. 225, Hupé (4).

Calymene small moult-stages recorded p. 512, Tasch.

Calymene interjecta Barr. p. 154, *C. sp.* p. 151, Chlupáč (2).

Calymene intermedia Lindström, *C. sp.* listed p. 112, Lawson.

Calymene cf. *intermedia* Lindstrom p. 218, Straw.

Calymene [s. l.] *macmillani* Roy 1941 holotype refiugured p. 148 pl. lxii figs. 7–9, *C. [s. l.] sp. ind.* for *C. croneisi* R. *partim* (fig. 124d refiugured) p. 149 pl. lxii figs. 10–12; *C. croneisi* R. restr. referred to *Flexicalymene* but may belong to *Reacalymene* as may *C. fayettensis* Slocum 1913 p. 148, Whittington (1).

Calymene (*Calymene*) aff. *reperta* (Oehlert) p. 20, Fillet (2).

Calymene [misspelt *Clymene* at descr.] *sanmigueli* sp. n. p. 287 text-fig. 1 Ordovician Spain (Badajoz), Linares Rodríguez Estud. geol. Inst. Mallada No. 12 1950.

Calymene senaria p. 690, Clark & Strachan.

Calymene tristani Brongniart, *C. sp.?* p. 36, Dupuis.

Calymene tristani var. *bavarica* Barrande 1868 a synonym of *Bavarilla hofensis* B. p. 35, Sdzuy.

Calymene n. sp. [undescr.] p. 315, Chlupáč (1).

Calymene n. sp. [undescr.] p. 371, *C. sp.* p. 342, Horný.

Calymenesum [recte *Calymenesus*] Kobayashi 1951 referred to Reedocalymeninae subfam. n. p. 227, Hupé (4).

Calymenid? [pygidium] p. 425 pl. xl fig. 120, Whittington (2).

Calymenidae — Pharostomatidae Hupé 1953 a synonym, family considered fundamentally opisthoparian, *Cliffia* and *Calymenidius* show similarities to Calymenidae p. 30, see *Pharostomina* gen. n. and *Bavarilla*, Sdzuy.

Calymenidae classified into Calymeninae and Colpocoryphinae & Reedocalymeninae subfamm. n. p. 225, Hupé (4).

Calymeninae nov. as a subfamily of Calymenidae for *Calymene*, *Diacalymene* and *Papillicalymene* p. 225, Hupé (4).

Calymenopsis Bergeron 1895 considered close to or synonymous with *Euloma* [quod vide] p. 30, Sdzuy.

Calymenopsis filacovi M.-Chalm. & Berg. referred tentatively to Eulominiae subfam. n. p. 450, Kobayashi (1).

Calyptaulax recorded p. 1436, Evitt.

Calyptaulax? *goodridgii* (Schuchert 1900) holotype refiugured with synonym *C. sillimani* Roy 1941 (refiugured) p. 134 pl. lxii figs. 1–6; *Dalmanites intermedius* of Clarke 1897 referred to *C. p. 135*, Whittington (1).

Camaraspis fragments p. 1515, Wilson (1).

Carolinites sp. A [undescr.] p. 15, Hintze (1).

Cedaria eurycheilos sp. n. Cambrian (Upper) U.S.A. (Texas) p. 726 pl. lxxx figs. 5–7, *C. burnetensis* (Walcott) referred to *Bolaspidella* p. 740, Palmer J. Paleont. 28 6 1955.

Cedariidae — pygidia assigned by Lochman 1950 to *Sympacheilus* belong here p. 734, Palmer (1).

Cedarina cordillerae (Howell & Duncan) p. 727 pl. lxxx figs. 8, 10, Palmer (1).

Celmus granulatus Ang. p. 115, *C. aff. g.* p. 127, Bohlin.

Ceratocephala (Acidaspis) tuberculata Conrad—the supposed graptolite *Monograptus beecheri* Girty 1895 represents the cephalic margin of this or related form pl. xii, Ruedemann.

Ceratocephala verneuili (Barr.) p. 353, Horný.

Ceratocephala verneuili (Barr.) p. 384, *C. cf. vesiculososa* (Beyr.) p. 385, Svboda & Prantl (2).

Ceratocephala verneuilli (Barr.) p. 582, Bouček & Fřibyl.

Ceratocephala vesiculososa (Beyr.) p. 154, Chlupáč (2).

Ceratocephala vesiculososa (Barr.) [sic] p. 219, Svboda & Prantl (1).

Ceratocephala vesiculososa (Barr.) [sic] p. 534, Svboda & Prantl (4).

Ceratocephala? sp. p. 20, Pillet (2).

Ceratonurus krejčii (Nov.) p. 154, Chlupáč (2).

Ceratopeltis Poulsen 1937 referred tentatively to Proceratopyginae subfam. n. p. 67, Kobayashi & Ichikawa.

Ceratopyge canadensis Walcott 1912 type of *Housiella* gen. n. [Kobayashi] p. 66, Kobayashi & Ichikawa.

Ceratopygidae see *Boschchekulia* gen. n.

Ceratopygidae Raymond discussed and classified into Proceratopyginae subfam. n. [Kobayashi], Housiinae and Ceratopyginae p. 67, Kobayashi & Ichikawa.

Ceratopygidae Raymond 1913 discussed, Asaphidae (but not Asaphiscidae) considered related p. 20, Szdzy.

Ceratopyginae emend. taken to include *Ceratopyge*, *Hysterolenus*, *Diceratopyge* and *Dichelepyge* p. 67, KOBAYASHI in Kobayashi & Ichikawa.

Ceraurinella? ind. sp. for *Cybele rugosa* [partim] of Elles 1922 (p. 145) p. 422 pl. xl figs. 102, 107, 111, Whittington (2).

Ceraurinus icarus (Billings) p. 26 ff., Baillie.

Ceraurinus marginatus Barton 1913 [type of *C.*] may be congeneric with *Remipyga glabra* gen. et sp. n. [quod vide] p. 128, *C. daedalus* Cox 1933 discussed & referred to *R.* p. 130, *C. icarus noduliferous* [sic] Roy 1941 may be conspecific with *R. glabra* p. 130, Whittington (1).

Cerauroides hawlei (Barr.) p. 355, Horný.

Ceraurus intermedium sp. n. Ordovician (Upper) Poland (Lysa Gora) including in synonymy *Cheirurus insignis* of Olin 1906 and ? Ravn 1899 p. 216 (65) pl. i figs. 1—8, pl. ii figs. 1—6 text-figs. 1 (reconstruction), 2 (meraspid cranidia), Kielan Acta geol. polon. 5 2 [Palaeont.] 1955.

Ceraurus pleurexanthemus (Green) p. 36, Baillie.

Ceraurus pleurexanthemus p. 690, Clark & Strachan.

Ceraurus sp. p. 129, Bohlin.

Ceraurus sp. p. 11, JAANUSSON in Jaanusson & Mutvei.

Ceraurus sp. p. 154, WILSON in Fortier.

Ceraurus [s. l.] sp. ind. p. 131 pl. ix fig. 6; *C. horridus* Troedsson 1928 partim (pl. 17 figs. 1—3—cephalon) referred to *Hapsiceraurus* gen. n. [quod vide] p. 127, Whittington (1).

Ceraurus (undescribed) p. 21, Poulsen & Rasmussen.

Ceraurus recorded p. 1436, Evitt.

Ceraurus? or *Neolenus?* p. 19, Sampelayo.

Changshania conica Sun p. 25, Endo (1).

Chariocephalus sp. recorded p. 2055, Flower.

Chasmops conicophthalma p. 34, SPJELDNAES in Hagemann & Spjeldnaes.

Chasmops macrourus Sjögren, C. n. sp. [undescr.] p. 237, Martna.

Chaunoproetus palensis p. 229, C. sp. p. 247, Rabien.

Cheilocephalus Berkey 1898 discussed with description p. 757, *Pseudolisania* Kobayashi 1935 a subjective synonym p. 758, *C. brevirostra* (Walcott) with synonyms *P. raaschi* & *P. texana* Lochman p. 759 pl. lxxxviii figs. 1-4, *C. minutus* sp. n. Cambrian (Upper) U.S.A. (Texas) p. 759 pl. lxxxviii figs. 5, 6, 8, Palmer J. Paleont. 28 6 1955.

Cheilocephalus n. sp. [undescri.] p. 1515, Wilson (1).

Cheirurid hypostome p. 131, Whittington (1).

Cheiruridae see Crotalurinae subfam. n.

Cheirurinae see *Hapsicerurus* and *Remipyga* genn. n.

Cheiuroides orientalis Resser & Endo p. 111, Endo (2).

Cheirurus bicuspis Bouček p. 347, *C. cf. b.* p. 365, *C. quenstedti* Barr. p. 347, *C. insignis* B. p. 377, *C. sp.* (ex gr. *C. insignis*) p. 382, *C. obtusatus* B. p. 379, *C. sp.* ind. p. 323, *C. (Crotalocephalus)* [sic] sp. p. 334, Horný.

Cheirurus (Cheirurus) bicuspis Bouček p. 526, *C. (Crotalocephalus) gibbus* Beyr. mut. nov. [undescri.] p. 531, Svoboda & Prantl (4).

Cheirurus discretus Barrande 1868 with possible synonym *C. gracilis* B. referred to *Pilekia* p. 44, Šdžuy.

Cheirurus (Crotalocephalus) gibbus Beyrich listed from Sahara p. 23, Le Maitre (2).

Cheirurus (Crotalocephalus) gibbus Beyr., *C. (C.) globifrons* (Hawle & Corda), *C. (C.) sternbergi*, *C. (C.) cf. pauper* Barr. spp. p. 154, *C. (C.) gibbus* Beyr. nov. mut. [undescri.] p. 151, Chlupáč (2).

Cheirurus (Crotalocephalus) gibbus Beyr. p. 387, *C. (C.) globiceps* Hawle & Corda p. 388, Svoboda & Prantl (3).

Cheirurus (Crotalocephalus) gibbus (Beyr.), *C. (Crotalocephalus) cf. sternbergi* B. p. 438, Svoboda & Prantl (3).

Cheirurus (Crotalocephalus) [sic] gibbus (Beyr.) nov. mut. [undescri.] pp. 314, 326, Chlupáč (1).

Cheirurus insignis of Olin 1906 and ? Ravn 1899 referred to synonymy of *Ceraurus intermedius* sp. n. p. 216 (65), Kielan.

Cheirurus (C.) quenstedti Barr. p. 208, *C. (Crotalocephalus) gibbus* (Beyr.) mut. [undescri.] p. 213, Svoboda & Prantl (1).

Cheirurus (Crotalocephalus) aff. sternbergi (Boeck) recorded with synonymy p. 6, Pillet (1).

Cheirurus (Crotalocephalus) aff. sternbergi (Boeck) p. 21, Pillet (2).

Cheirurus (Cheirurus) transiens Bouček p. 582, Bouček & Přibyl.

"*Cheirurus*" sp. p. 128 pl. iii fig. 1, Bohlin.

Chuangia batia (Walcott) p. 109, Endo (2).

Chuangia puteata Resser & Endo a synonym of *C. batia* (Walcott); *C. planicaudata* sp. n. p. 70 pl. ix fig. 13, pl. x figs. 10-11, *C. conica* sp. n. p. 71 pl. viii figs. 2, 4-6 Cambrian (Upper) Manchuria, *C. batia* (W.) var. [undescri.] p. 10, *C. transversalis* Kobayashi, *C. kawadai* K., *C. nitida* W. p. 9, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Chuangia [recte *Chuangia*] *batia* Walcott p. 65, Kobayashi & Ichikawa.

Clelandia? sp. p. 456 pl. vi figs. 5a-b, Kobayashi (1).

Cnemidopyge gen. n. [Raphiophoridae] p. 21 for type *Ampyx nudus* (Murchison) and including *A. bisectus* Elles & provisionally *A. costatus* Boeck, *C. granulata* sp. n. Ordovician (Middle) Britain (Shropshire) p. 22 pl. ii figs. 9-12, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Cobboldia dentata Lermontova refigured p. 23 pl. iii figs. 2, 2a-e, Lermontova (1).

Cobboldia dentata Lerm. table 1, Zelenov, Zhuravleva & Korde.

Coignouina see *Otarion*.

Coleopachys Raymond 1937 referred tentatively to Solenopariidae p. 116, Hupé (4).

Colpocoryphe Novák 1918 referred to Calymenidae (Colpocoryphinae) subfam. n. p. 225, Hupé (4).

Colpocoryphinae subfam. n. (Caly-menidae) p. 225 for *Colpocoryphe*, *Synhomalonotus*, *Flexicalymene*, *Rea-calymene*, *Gravicalymene*, *Metacaly-mene* and *Platycalycene*, Hupé Ann. Paléont. 41 1955.

Columbicephalus gen. n. [Ogygio-carinae] for type *C. macrops* sp. n. p. 444 pl. v figs. 7a-b Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Comura see *Asteropyge*.

Conocephalites adamsii Billings 1861 see *Billingsaspis*, *C. vulcanus* B. 1861 considered (following Matthew 1897) the junior synonym of *C. adamsii* p. 778 [see also *Ptychoparia a.* & *P. v.*], *C. teucer* B. 1861 see *Ptychoparella*, Shaw (2).

Conocephalites innotatus Barrande 1868 with synonyms *C. extremus*, *C. discrepans*, ? *C. problematicus* B. spp. referred to *Niobe* (*Niobella*) p. 22; *C. (Bavarilla) hofensis* B. 1868 with synonyms *C.?* *münsteri* & *C. quaesitus* B. spp. to *Bavarilla* p. 35; *C. bavaricus* B. 1868 type of *Pterococephalina* (*Leimitzia*) subgen. n. p. 37, Sdzuy.

Conocoryphe aequalis Linrs. var. *orientalis* var. n. p. 21 pl. i figs. 15-17 Cambrian (Middle) U.S.S.R. (Turkestan), Lermontova Middle Cambrian trilobites and gastropods from Shodý-Mira, 1951.

Conocoryphe sulzeri *sulzeri* (Schloth.) p. 184 ff., Havlíček & Snajdr.

Conocoryphidae see *Meneviellinae* subfam. n.

Coosella Lochman 1936 type of Coosellidae fam. n., *C. belensis* L. with synonym *C. occidens* L. p. 728 pl. lxxviii figs. 4-5, *C. cf. C. granulosa* Rasetti p. 730 pl. lxxviii figs. 2-3, *C. cf. C. widnerensis* (Resser) [for *Maryvillia w.* R.] p. 730 pl. lxxviii fig. 1, *C. sp.* p. 730 pl. lxxix fig. 1; *Maryvillia hybrida* Resser is an unidentifiable sp. of *C.* p. 722, *C. texana* R. a synonym of *Coosella connata* (Walcott) [quod vide] p. 731, Palmer (1).

Coosellidae fam. n. for *Coosella* Lochman 1936, *Coosia* Walcott 1911, *Crepicephalus* Owen 1852, *Syspacheilus* Resser 1938 p. 727 text-fig. 4, Palmer J. Paleont. 28 6 1955.

Coosellidae Palmer 1954 [recte 1955]—if *Crepicephalus* is included the family should be called Crepi-cephalidae Kobayashi 1935 p. 37, Sdzuy.

Coosia Walcott 1911 discussed and referred to Coosellidae fam. n. p. 730, *C. cf. C. albertensis* Resser p. 731 pl. lxxvii figs. 7, 9, 10, *C. connata* (Walcott) with synonyms *C. magna* Lochman and *Coosella texana* Resser p. 731 pl. lxxviii figs. 6-7; *C. connata* Lochman & Duncan 1944 (non W.) may be undetermined sp. of *Coosella*, Palmer (1).

Coosia Walcott 1911 similar to members of Paracoosiinae p. 37, Sdzuy.

Coosia Walcott 1911—*Metanomo-care* Lermontova 1940 a synonym p. 169, Hupé (4).

Coosia alfaensis sp. n. p. 2 [unilustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 30 1954.

Coosia alfaensis Rusconi illustrated p. 31 pl. ii fig. 10, Rusconi (5).

Coosia deprati Mansuy type of *Manchurocephalus* gen. n. [quod vide] pp. 95-96, Endo (1).

Cordania see *Piltonia* gen. n.

Cornuproetus see *Proetus*.

Cornuproetus lepidus (Barr.) p. 314, Chlupáč (1).

Cornuproetus lepidus Barr. p. 385, Svoboda & Prantl (2).

Cornuproetus lepidus (Barr.) p. 529, Svoboda & Prantl (4).

Cornuproetus (*C.*) cf. *subfrontalis* (Whidborne) [after record of J. Péneau] p. 17, Pillet (2).

Cornuproetus vetustus (Barr.) p. 355, Horný.

Coronura aspectans (Hall) recorded from Sahara p. 254, Le Maître (1).

Coronura aspectans (Conrad) Hall from Sahara p. 151 pl. xx fig. 30; *Psychopyge elegans* G. & H. Termier [type of *P.*] may be a pygidial fragment of *C.* p. 151n, **Le Maître** (2).

Corrugatagnostus Kobayashi 1939 discussed and considered a full genus p. 6, *C. morea* (Salter) of which *Agnostus perrugatus* Barrande (holotype refigured text-figs. 2 b, c) a synonym p. 10 pl. i figs. 9–11, *C. sol* sp. n. for *A. perrugatus* of Reed 1903 Ordovician (Upper) Britain (Scotland) syntypes figured p. 12 pl. i figs. 12–13, **Whittard** Palaeontogr. Soc. [Monogr.] **109** 1955.

Corydocephalus heteroclyta (Barr.) p. 526, **Svoboda & Frantl** (4).

Corynexochidae Angelin 1852 discussed p. 98, **Lermontova** (1).

Corynexochidae see *Judaiella, Bathyuriscellus, Jakutus* genn. n.

Corynexochina Lermontova 1940 discussed, *C. weberi* L. p. 23 pl. ii figs. 5–9, *C. inflata* sp. nov. [nom. nud.] p. 26 Cambrian (Middle) U.S.S.R. (Kazakhstan), **Lermontova** (2).

Craigheadia Hupé 1953 [recte gen. n.] [Scutellidae or Styginidae] p. 206 for type *Eobronteus grayi* (Reed 1904) Ordovician (Upper) Britain (Scotland), **Hupé** Ann. Paléont. **41** 1955.

Crassifimbra species undetermined No. 1 p. 19 pl. iii fig. 23, *C.* sp. undet. No. 2 p. 20 pl. ii figs. 9–10 Cambrian (Lower) Canada (Quebec) [in boulders], **Rasetti**.

Crepicephalidae see *Coosellidae*.

Crepicephalidae Kobayashi 1935 considered an unnatural association, genera referred to *Coosellidae* and *Tricrepicephalidae* famm. n. [quae vide] pp. 727, 752, Palmer (1).

Crepicephalina mukdensis Resser & Endo p. 110, **Endo** (2).

Crepicephalina pergranosa Resser & Endo p. 15, *C. convexa* (Walcott), *C. mukdensis* R. & E. p. 21, *C. bispinosa* E. p. 29, *C. quadrata* R. & E. p. 22, **Endo** (1).

Crepicephalinae — *Meteoraspis* referred p. 139, **Hupé** (4).

Crepicephalus Owen 1852 referred to *Coosellidae* fam. n., *C. australis* sp. n. p. 732 pl. lxxvii figs. 5, 8, *C. cf. C. iowensis* (Owen) p. 732 pl. lxxvii figs. 3, 6, *C. ? perplexus* sp. n. p. 733 pl. lxxvii figs. 1, 2, 4 Cambrian (Upper) U.S.A. (Texas), **Palmer** J. Paleont. **28** 6 1955.

Crepicephalus ceratopygooides Raymond 1925 referred tentatively to *Leiostegium* (*Evansaspis*) subgen. n. p. 421, *C.* sp. indt. R. 1925 discussed p. 453, **Kobayashi** (1).

Crepicephalus orientalis Endo p. 9, **Endo** (1).

Crepicephalus orientalis Endo p. 109, **Endo** (2).

Cromus see *Encrinurus*.

Crossura Moberg & Segerberg 1906 may be young form of *Euloma* p. 40, **Sdzuy**.

Crotallocephalus see *Cheirurus*.

Crotalocephalus see *Cheirurus*.

Crotalurinae subfam. n. [? *Cheiruridae*] p. 248 for *Crotalurus*, **Hupé** Ann. Paléont. **41** 1955.

Crotalurus Volborth 1858 referred to *Cheiruridae* (*Crotalurinae*) subfam. n. p. 248, **Hupé** (4).

Cruzoia Walcott 1924 referred tentatively to *Menomoniidae* p. 163, **Hupé** (4).

Cryphops see *Phacops*.

Cryptolithid (undescribed) from Middle Ordovician of Oslo which may be the same as Thorslund's 1948 record of *Reedolithus carinatus* [quod vide] p. 46 n., **SPJELDNAES** in **Hagemann & Spjeldnaes**.

Cryptolithus goldfussi (Barr.) not a synonym of *C. ornatus* (Sternb.) p. 5 n., listed p. 4 ff., **Röhlich & Chlupáč**.

Cryptolithus ornatus (Stbg.) p. 212 ff., **Havlíček & Šnajdr**.

Cryptolithus stelarusconii Rusc., *C.* sp. pp. 10, 51, **Rusconi** (5).

Cryptolithus tesselatus p. 690, **Clark & Strachan**.

Ctenopyge affinis Westergård p. 529, **Lindström**.

Cummingella Reed 1942 placed on Official List of Generic Names, type species (designated under Plenary Powers) *Phillipsia jonesii* Portlock [quod vide] p. 27, Opinion 352.

Cummingella Reed 1942 emend. Stubblefield 1952 referred to *Phillipsiinae* p. 410, **Přibyl**.

Curiaspis gen. n. [Proparia incertae familiae] p. 41 for type *C. notabilis* sp. n. p. 42 pl. vii figs. 11–15 text-fig. 47 Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Cybele loveni var. *girvanensis* Reed type of *Paracybeloides* gen. n. p. 251, **Hupé** (4).

Cybele verrucosa & *C. rugosa* [partim] of Elles 1922 (p. 145) referred to *Atractopyge* ind. sp. p. 423, *C. rugosa* [partim] to *Ceraurinella*? ind. sp. p. 422, **Whittington** (2).

Cybelidae Holliday 1942 emend. considered a subfamily of Encrinuridae to include *Cybelella*, *Cybeloides*, *Paracybeloides* gen. n., *Cybelopsis*, *Cybele* and *Ectenonotus* p. 251, **Hupé** (4).

Cybeloides aff. *C. primus* (Raymond) p. 363, **Cloud & Barnes**.

Cyclognathina gen. n. [Olenidae (Triarthrinae)], *C. microps* sp. n. p. 20 pl. v figs. 6–9, pl. i fig. 1 pars d Cambrian (Upper) U.S.S.R. (Kazakhstan), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Cyclopyge rediviva (Barr.) p. 4 ff., *C. sp.* p. 9, **Röhlich & Chlupáč**.

Cyclopyge speciosa (Corda) p. 210, *C. rediviva* (Barr.) p. 213, **Havliček & Šnajdr**.

Cyphaspides barrandei holynensis Růžička p. 224, **Svoboda & Prantl** (1).

Cyphaspis sp. p. 1988, **Fisher**.

Cyphaspis sp. p. 2, **Růžička & Houška**.

Cyphinioides Reed 1942 referred to *Phillipsiinae* p. 410, **Přibyl**.

Cyphoniscus Salter 1853 referred to Isocolidae p. 129, **Hupé** (4).

Cyphoproetus regulosus [sic] Bouček p. 528, **Svoboda & Prantl** (4).

Cyphoproetus rugosus Bouček p. 315, **Chlupáč** (1).

Cyrtodechenella meles p. 125, *C. cyrto* p. 133, **Krämmelbein et al.**

Cyrtometopus clavifrons (Dalman) pl. iii fig. 3, *C. aff. c.* p. 128, *C. sp.* pl. iii fig. 4, ? *C. sp.* p. 115, **Bohlin**.

Cyrtosymbole (*Calybole*) *bergica*? p. 247, **Rabien**.

Cyrtosymbole (*Calybole*) *gracilis* sp. n. p. 54 pl. ii figs. 10–13 Devonian (Upper) Germany (Thüringia), *C. (Calybole) denckmanni* R. & E. Richter pl. ii fig. 15, **R. & E. Richter** Senck. leth. 36 1–2 1955.

Cyrtosymbole hicksi (Whidborne 1896) for *Phillipsia h.* W. 1896 restr. (pl. 2 fig. 5), *C. (Macrobole) hercules* R. & E. Richter 1951 pl. i fig. 3, *C. (M.) duodecimae* R. & E. R. 1951 [complete specimen found] including with query *P. hicksi* W. partim (pl. 2 fig. 8) p. 32 pl. i fig. 2 text-figs. 5a, b, *C. (M.) mulesi* sp. n. p. 34 pl. i fig. 1 text-figs. 2a–c, *C. (Waribile) porteri* sp. n. p. 35 pl. i figs. 4–7 text-figs. 1a–c, 4a–b Carboniferous (Lower) England (Devon), **Goldring** Senck. leth. 36 1–2 1955.

Cyrtosymbole? *superstes* (Barr.) p. 541, **Svoboda & Prantl** (4).

Dactylocephalus Hsü 1936 [sic] referred to Dikelokephaliniae p. 37, **Sdzuy**.

Dactylocephalus Hsü 1948 [erroneously ascribed to Kobayashi 1951] referred to Dikelokephaliniae p. 173, **Hupé** (4).

Dalmaniopsis Geinitz 1862 which was erected provisionally for *Dalmanites*? *kablikae* G. (of which the original is destroyed) considered to be not a trilobite p. 294, **R. & E. Richter** (3).

Dalmanites intermedium Walcott 1877 [type of *Eomonorachus* Delo quod vide] originals not known, *D. intermedium* of Clarke 1897 referred to *Calyptaulax* p. 135, **Whittington** (1).

Dalmanites? *kablikae* Geinitz see *Dalmaniopsis*.

Dalmanites cf. nexilis Salter p. 303 pl. i fig. 25, **Le Maitre** (3).

Dalmanites orba Barr. p. 319, **Horný**.

Dalmanites vulgaris (Salter) p. 89ff., **Lawson.**

Dalmanites vulgaris (=caudatus Brunn) Salter p. 218, **Straw.**

Dalmanites weaveri p. 5, *D. vulgaris* p. 6, **Curtis.**

Dalmanites sp. listed p. 23, **Le Maître** (2).

Dalmanitina proeva proeva (Emmrich 1839) and *D. proeva socialis* (Barrande 1852) [type of *D.*] discussed and so referred, *D. p. grandis* (B. 1852) so referred p. 128, **Prantl** (2).

Dalmanitina socialis (Barr.) p. 220, **Havlíček & Šnajdr.**

Dalmanitina socialis grandis (Barr.) p. 236 pl. i fig. 1, **Marek** (1).

Dalmanitina socialis grandis (Barr.) p. 8, **Marek** (2).

Dalmanitina socialis proaeva (Barr.) p. 3, **Röhlich & Chlupáč.**

Dalmanitina sp. p. 1988, **Fisher.**

Dalmanitinae — Upper Devonian forms p. 63 text-fig. 2, see also *Phacopidella* and *Asteropyge*, **R. & E. Richter** (1).

Damesella paronai (Airaghi), *D. damesi* Resser & Endo, *D. conica* R. & E. p. 110, **Endo** (2).

Damesella paronai (Airaghi) hypostome p. 93 pl. xiv fig. 8, **Kobayashi** (2).

Damesella walcotti Resser & Endo 1937 a synonym of *D. paronai* (Airaghi); *D. convexa* sp. n. p. 67 pl. iii fig. 5 Cambrian (Middle) Manchuria, *D. quadrata* E. p. 19, *D. conica* R. & E. p. 20, *D. bella* R. & E. p. 33, *D. sp.* p. 44, *D. insolita* E. p. 32, *D. damesi* R. & E. p. 32, **Endo** Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Damesellidae — ontogeny discussed p. 90 ff. pl. xiv figs. 14a-b, 15a-b, figs. a-g, **Kobayashi** (2).

Damesellinae see *Blackwelderoides* gen. n.

Dartonaspis cf. *D. knighti* listed p. 460, **Okulitch & Bell.**

Dawsonida ord. n. (nom. n. for *Eodiscidi* Kobayashi 1939 since *Dawsonia* Hartt 1868 has priority over *Eodiscus* Matthew 1896) p. 14, classified into Dawsonidae and Pageidae, *Lermontova* Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Dawsonidae Resser name preferred to *Eodiscidae* Raymond, family referred to *Dawsonida* p. 14, *Lermontova* (1).

Dechenella praeverneuili R. & E. Richter [nom. nud.] pp. 236, 240 Devonian (Middle) Germany (Rhine-land), **Glinski.**

Dechenella (*Dechenella*) *verneuili* (Barr.) p. 104 ff., *D. (D.) burmeisteri* s. l. p. 139 ff., *D. struvei* p. 151 ff., *D. (Basidechenella) kayseri* p. 22 ff., **Krömmelbein et al.**

Dechenella verneuili p. 284, **Struve.**

Dechenellinae — *Drevermannia* Richter excluded p. 504, **Přibyl & Plas.**

Decoroproetus decorus (Barr.) p. 320, **Horný.**

Deiphon forbesi Barr. p. 207, **Svoboda & Prantl** (1).

Deiracephalus aster (Walcott) p. 759 pl. lxxxix fig. 5, **Palmer** (1).

Deissella Howell & Duncan 1939 a synonym of *Bolaspidella* Resser 1937 p. 739, **Palmer** (1).

Delaria Weller 1944 referred to Phillipsiinae p. 410, **Přibyl.**

Deltophthalmus [recte *Deltophthalminus*] Resser 1938 a synonym of *Bolaspidella* R. 1937 [quod vide] p. 739, **Palmer** (1).

Denckmanites see *Phacopidella*.

Denckmannites see *Phacopidella*.

Densonella sp. p. 742 pl. lxxxiii fig. 7, **Palmer** (1).

Diacalymene Kegel 1927 emend. Shirley 1936 referred to Calymeninae p. 225, **Hupé** (4).

Diacalymene diademata (Barr.) p. 379, *D. tenera* (B.) p. 381, **Horný.**

Diacanthaspis recorded p. 1436, **Evitt.**

Dianops see *Phacops*.

Dicellocephalus ? villebruni Bergeron type of *Asaphopsoides* gen. n. p. 173, Hupé (4).

Diceratocephalidae fam. n. for *Diceratocephalus* gen. n. p. 419 (431), Lu Acta palaeont. sinica 2 4 1954.

Diceratocephalus gen. n. [Diceratocephalidae] p. 419 (431) for type *D. armatus* sp. n. p. 420 (433) pl. i figs. 1-9 text-figs. 1-3 (drawings), *D. latifrons* sp. n. p. 421 (435) pl. i figs. 10-11 Cambrian (Upper) Manchuria; *Blackwelderia ? cornuta* Endo 1937 partim [cranidia pl. 63 figs. 1-3] may belong to *D. a.* or *D. l.* p. 433, Lu Acta palaeont. sinica 2 4 1954.

Diceratopyge Troedsson 1937 referred to Ceratopyginae p. 67, Kobayashi & Ichikawa.

Diceratopyge troedsonni sp. n. Ordovician (Tremadoc) Germany (Hof) p. 21 pl. iv figs. 93-94 text-figs. 15-17 (drawings), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Dichelepyge Harrington & Leanza 1952 referred to Ceratopyginae p. 67, Kobayashi & Ichikawa.

Dicranopeltis scabra (Beyr.) p. 207, Svboda & Prantl (1).

Dicranopeltis scabra (Beyr.) p. 379, *D. scabra* (B.) n. var. [undescr.] p. 360, Horný.

Dicranopeltis scabra (Beyrich) var. p. 526, Svboda & Prantl (4).

Dicranurus monstrosus (Barr.) p. 154, Chlupáč (2).

Dictyella subquadrans n. sp. [nom. nud.] p. 38, *D. sp.* p. 7, Endo (1).

Dictyella trigonalis Kobayashi p. 109, Endo (2).

Dienstina see *Phacopidella*.

Dikelocephalid remains recorded p. 460, Okulitch & Bell.

Dikelocephalidae — close affinity with Richardsonellidae denied p. 25, resemblances to Anomocaridae may be homeomorphic p. 36, Sdzuy.

Dikelocephalidae (Dikelocephalinae) see *Manchurocephalus* gen. n.

Dikelocephalus celticus Salter 1866 probably belongs to *Pterocephalina* p. 37, Sdzuy.

Dikelocephalina Brögger 1896 relations to *Pterocephalina* (*Leimitzia*) subgen. n. p. 37, *D. sp.* A p. 38 pl. vii figs. 98-100, *D. sp.* B p. 39 pl. viii fig. 1 Ordovician (Tremadoc) Germany (Hof), Sdzuy.

Dikelocephalininae see *Asaphopsoides* gen. n.

Dikelocephalininae Kobayashi 1936 referred to Anomocaridae and taken to include *Dikelocephalina*, *Asaphopsis*, *Hungioides* & *Dactylocephalus* p. 37, Sdzuy.

Dimeropyge raymondi (Roy 1941) holotype refigured p. 145 pl. lxiii figs. 7, 8, 11, 12, 15, 16, Whittington (1).

Dimeropygidae — *Dimeropygiella* Ross 1951 referred p. 124, Hupé (4).

Dimeropygiella Ross 1951 referred to Dimeropygidae p. 124, Hupé (4).

Dimeropygiella eos sp. n. Ordovician (Lower) Canada (B.C.) p. 456 pl. vi fig. 10, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Dimeropygiella n. spp. a & b [undescr.] p. 16, Hintze (1).

Dindymene sp. p. 4, Röhlich & Chlupáč.

Dinesidae Lermontova 1940 discussed p. 108, Lermontova (1).

Dinesus Etheridge 1896 discussed p. 113, *D. ida* E. discussed p. 114, *D. kirghizensis* [kirghisensis on p. 174] sp. nondescr. p. 118 pl. xvi figs. 4, 4', 4a-c Cambrian (Middle) U.S.S.R. (Kazakhstan), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Dionide Barrande 1847 validated by suppression of *Polytomurus* Corda 1847 and placed on Official List of Generic Names p. 453, Opinion 350.

Dionideae Gürich 1907 emended to Dionididae [quod vide], Direction 28.

Dionididae [emended from Dionideae] Gürich 1907 placed on Official List of Family-Group Names p. 496, Direction 28.

Diplagnostus indianus sp. n. Cambrian (Middle) Argentina (Mendoza) p. 14 pl. i fig. 13, Rusconi Rev. Mus. Hist. nat. Mendoza 8 1-4 1955.

Dipleura see *Homalonotus*.

Dipleuropyge gen. n. [Incertaina sedis] for type *D. striata* sp. n. p. 30 pl. iii figs. 3–10 Cambrian (Upper) U.S.S.R. (Kazakhstan), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Distazeris Raymond 1937 compared with *Utiadae* p. 131, Hupé (4).

Ditomopyge Newell 1931 emend. Weller 1936 referred to *Phillipsiinae* p. 410, Přibyl.

Ditomopyge Newell 1931 — *Neophillipsia* Gheyselinck 1937 a synonym p. 188, Hupé (4).

Ditomopyge from Nevada p. 2247, Dott.

Ditomopyginae Hupé 1953 a synonym of *Phillipsiinae* p. 409, Přibyl.

Dolichoharpes arctica sp. n. p. 146 pl. lxiii figs. 17–19 Ordovician (? Upper) Canada (Baffin I.), Whitington Mem. geol. Soc. Amer. No. 62 1954.

Dolichometopsis bicensis Rasetti listed p. 3, Rasetti.

Dorypyge quadriceps (Rjonsnitzky) type of *Jakutus* gen. n. p. 105, Lermontova (1).

Dorypyge richthofeni Dames — following considered synonyms *D. pergranosa*, *D. matsushitai*, *D. bigranosa*, (tentatively) *D. toyamai*, *D. damesi* [partim] (pl. 31 figs. 14–16) Resser & Endo 1937 spp. p. 61; *D. sp.* listed p. 15, *D. bispinosa* Walcott p. 29, *D. kidoi* R. & E. p. 41, Endo (1).

Dorypyge richthofeni Dames p. 110, Endo (2).

Dorypyge richthofeni Dames p. 428, Lu.

Dorypyge richthofeniformis Lermontova p. 11 pl. i figs. 1–5, Lermontova (2).

Dorypygella — *Teinistion obtusus* and *T. sulcatus* Endo 1937 referred tentatively p. 93, Kobayashi (2).

Dorypygellinae metaprotaspides p. 90 pl. xiv figs. 14 a–b, 15 a–b, Kobayashi (2).

Dorypygidae Kobayashi discussed p. 118, Lermontova (1).

Drepanura inutilis Resser & Endo 1937 a synonym of *D. pusilla* R. & E.; *D. ketteleri* of Kobayashi 1935, ? *D. intermedia* R. & E. partim, *D. mina* R. & E. partim, ? *D. concentrica* E. & R. partim all in synonymy of *D. premesnili* Bergeron p. 68; *D. intermedia* R. & E. partim and *D. mina* R. & E. partim in synonymy of *D. ketteleri* Monke p. 69; *D. sp.* listed p. 14, Endo (1).

Drepanura premesnili Bergeron p. 110, Endo (2).

Drepanura premesnili Bergeron p. 425ff., Lu.

Drevermannia Richter 1913 so dated and tentatively referred (following Richter 1951 non 1950) to *Proetinae* p. 504, *D. (Eodrevermannia)* Přibyl 1946 discussed, *D. (E.) bouškai* P. p. 508 pl. i fig. 6, *D. (E.) rara* sp. n. Devonian (Middle) Czechoslovakia p. 509 pl. i figs. 3–5, *D. (E.) nitida* Růžička 1946 so dated [considered nom. nud. 1941] lectotype p. 510 pl. i figs. 1–2 [photographs], *D. (Formonia)* R. & E. Richter compared with *D. (Eodrevermannia)* p. 507, Přibyl & Plas Sborn. úst. geol. 21 [Pal.] 1955.

Drevermannia (Formonia) scheldana Matern 1927 holotype refigured p. 56 pl. ii fig. 9, R. & E. Richter (1).

Drevermannia (Drevermannia) schmidti pp. 225, 247, *D. (D.) cf. s.* p. 247, *D. spp.*, *D. n. sp.* [un-descr.] p. 247, Rabien.

Ductina see *Phacopidella*.

Dunderbergia Walcott 1924 discussed with description, pygidium newly assigned, *Megadunderbergia* Kobayashi 1939 rejected as being not a distinctive subgenus, *D. variangranula* sp. n. Cambrian (Upper) U.S.A. (Texas) p. 761 pl. lxxxvii figs. 7, 9, 10, pl. lxxxix fig. 1; *D. nitida* (Hall & Whitfield) pygidium originally assigned is referred to *Housia* sp., Palmer J. Paleont. 28 6 1955.

Dytremacephalus gen. n. [Ptychopariidae] p. 749 for type *D. granulosus* sp. n. p. 750 pl. lxxxv figs. 5–6, *D. laevis* sp. n. p. 750 pl. lxxxv figs. 1, 4 Cambrian (Upper) U.S.A. (Texas), Palmer J. Paleont. 28 6 1955.

Edmundsonia Cooper 1953 referred to Endymioniidae p. 264, Hupé (4).

Ehmania cf. *E. wyomingensis*, *E. wolcotti*, *E.* sp., *E?* sp. p. 1394, McMannis.

Eilura typa Resser & Endo with ascribed cranium p. 83 pl. iii figs. 13–15, *E. quadrata* E. p. 28, Endo (1).

Ellipsocephalus hoffii Schloth. p. 184 ff. pl. i [illustration of lumachelle], Havliček & Šnajdr.

Elrathia manchuriensis Resser & Endo a synonym of *Ptychoparia orientalis* R. & E. p. 73, *E. convexa* R. & E. of *E. iddingsi* R. & E. p. 74; *E. yentaiensis* sp. n. p. 74 pl. viii figs. 9–11 Cambrian (Upper), *E. taitzuensis* sp. n. p. 75 pl. iii figs. 6–8, *E. rara* sp. n. p. 75 pl. iii fig. 9, *E. sobyosiensis* sp. n. p. 75 pl. iii fig. 10 Cambrian (Middle) Manchuria, *E. hoboi* R. & E. p. 13, *E. conoidea* E. p. 20, *E.* cfr. c. p. 14, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Elvinia roemerri (Shumard) with synonym *E. texana* Resser [refigured] pl. xxxviii figs. 21–22, *E. shumardi* R. types refigured pl. xxxviii figs. 23–24, Cloud & Barnes.

Elvinia roemerri (Shumard), *E.* n. sp. [undescr.] p. 1515, Wilson (1).

Elvinia tetonensis recorded p. 460, Okulitch & Bell.

Elviinae see *Neotaenicephalus* and *Vermilionites* genn. n.

Emmrichellidae see *Metabowmania* and *Macroculites* genn. n. and *Amechilus*.

Emmrichellidae — *Stenocombus* tentatively referred p. 131, Hupé (4).

Encrinurid ? ind. gen. p. 423 pl. xl fig. 112, Whittington (2).

Encrinuridae classified into Cybelidae [sic] and *Encrinurinae* p. 271, Hupé (4).

Encrinurinae newly considered a subfamily of *Encrinuridae* to include *Cryptonymus*, *Encrinurus*, *Cromus*, *Atractopyge*, *Encrinurella*, *Dindymene*, *Plasiaspis*, *Encrinuroides* and *Bevanopsis* p. 253, Hupé (4).

Encrinuroides sp. ind. for *Encrinurus* sp. ind. Roy 1941 p. 131, Whittington (1).

Encrinurus beaumonti (Barr.) p. 1, Růžička & Bouška.

C. (*Encrinurus*) *beaumonti* (Barr.) p. 382, Svoboda & Prantl (2).

Encrinurus bowningensis Foerste recorded p. 1052, Crook.

Encrinurus (*Encrinurus*) *intercostatus* (Barr.), *E.* (*Cromus*) *beaumonti* (B.) p. 579, Bouček & Přibyl.

Encrinurus punctatus p. 216, Straw.

Encrinurus raricostatus (Walcott) p. 33, Baillie.

Encrinurus sulfureanus sp. n. p. 4 [unillustr.] Ordovician Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 30 1954.

Encrinurus sulfureanus Rusc. illustrated p. 58 pl. iv fig. 8, Rusconi (5).

Encrinurus (*E.*) *transiens* (Barr.) p. 346 ff., *E.* aff. *t.* p. 365, *E.* sp. p. 364, *E.* (*Cromus*) *beaumonti* (B.) p. 323 ff., Horný.

Encrinurus (*Encrinurus*) cf. *transiens* (Barrande), *E.* (*Cromus*) *beaumonti* (B.), *E.* (*C.*) cf. *boemicus* (B.) pp. 524–525, Svoboda & Prantl (4).

Encrinurus sp. listed p. 112, Lawson.

Encrinurus sp. p. 154, WILSON in Fortier.

Encrinurus sp. ind. Roy 1941 referred to *Encrinuroides* p. 131, Whittington (1).

Endymioniidae — *Edmundsonia* Cooper 1953 referred p. 264, Hupé (4).

Entomaspidae referred to Harpidae p. 258, Hupé (4).

Entorachis subgen. n. see *Psilaspis*.

Eobronteidae Sinclair 1949 a subjective synonym of Scutelluidae nom. n. [quod vide], R. & E. Richter (2).

Eobronteus grayi (Reed 1904) type of *Craigheadia* gen. n. p. 206, Hupé (4).

Eocyp hinium Reed 1942 referred to Phillipsiinae p. 410, Přibyl.

Eodiscidae see Dawsonidae.

Eodisc[id]s recorded from E. Greenland p. 25, J. W. Cowie in Winsnes.

Eodrevermannia see *Drevermannia*.

Eohomalonotus boemicus (Barr.) p. 6, Röhlich & Chlupáč.

Eohomalonotus? sp. p. 236, Marek (1).

Eohomalonotus n. sp. [undescr.] p. 8, Marek (2).

Eomonorachus Delo 1935—suggested that name should not be used as originals of the type *Dalmanites intermedius* Walcott 1877 have not been found p. 135, *E. deloi* Roy 1941 a synonym of *Calliops brevis* (R. 1941) p. 132, Whittington (1).

Eomonorachus intermedius, *E.* sp. p. 761, Weiss.

Eoptychoparia gen. n. [Ptychopariidae (Antagminae)] p. 13 for type *E. normalis* sp. n. p. 14 pl. i fig. 2 (drawing), pl. iii figs. 5–11, *E. angustifrons* sp. n. p. 15 pl. iii figs. 1–4, *E. intermedia* sp. n. p. 16 pl. iii figs. 12–15 Cambrian (Lower) Canada (Quebec) [in boulders]; *Ptychoparella taylori*, *P. minor* and [?] *P. walcotti* Resser spp. referred to *E.* p. 14, Rasetti Smithson. misc. Coll. 128 7 1955.

Eoshumardia gen. n. [nondescr. 1953] [Shumardiidae] p. 134 for type

Shumardia orientalis Mansuy 1916 Cambrian (Upper) Yunnan text-fig. 134 bis (7) drawing, Hupé Ann. Paléont. 41 1955.

Erbia sibirica (Schm.) p. 112 pl. xvi fig. 2, *E. granulosa* Lerm. refigured p. 112 pl. xvi fig. 3, Lermontova (1).

Erbia sp. p. 27 pl. ii fig. 11, *E. spinulosa* sp. n. [nom. nud.] p. 27 Cambrian (Middle) U.S.S.R. (Kazakhstan), Lermontova (2).

Erbia sp. table 1, Zelenov, Zhuravleva & Korde.

Eremiproetus see *Proetus*.

Eremiproetus cf. *eremita* (Barr.) p. 223, Švoboda & Prantl (1).

Eremiproetus cf. *vicinus* (Barrande) [after record of J. Péneau] p. 17, Pillet (2).

Eteraspis Resser 1935 referred to Solenopariidae p. 116, Hupé (4).

Eudolatites angelini (Barr.) p. 3 ff., Röhlich & Chlupáč.

Euloma Angelin referred to Ptychoparidae (Eulominae) subfam. n. p. 449, Kobayashi (1).

Euloma Angelin 1854 discussed and referred to Olenidae incertae subfamiliae [quod vide], *Highgatella* a near relation p. 18, *E. geinitzi* (Barrande 1868) neotype p. 19 pl. iii figs. 77–89 (?87), pl. iv figs. 90–92, text-figs. 12–14, *E. monile praemonile* Lake considered very close to *E. geinitzi* p. 20; *Crossura* Moberg & Segerberg 1906 may be a young form of *Euloma* p. 40, Sdzuy.

Euloma sp. p. 118, Bohlin.

Eulomella gen. n. [Ptychoparidae (Eulominae)] p. 450 for type *E. mckayensis* sp. n. Ordovician (Lower) Canada (B.C.) p. 451 pl. vi fig. 3, pl. ix fig. 1 (restored), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Eulomina Kobayashi 1931 referred tentatively to Eulominae subfam. n. p. 450, Kobayashi (1).

Eulominae subfam. n. [Ptychoparidae] p. 449 for *Euloma*, *Pareuloma*, & *Eulomella* gen. n. [? and tentatively *Eulomina* p. 450], Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Eurudagnostus gen. n. [Rudagnostidae] p. 7 for type *E. grandis* sp. n. p. 8 pl. ii figs. 1, 2, 3, 3a, 4, *E. brevispinus* sp. n. p. 9 pl. ii figs. 5, 6, 6a, 7, pl. i fig. 1 pars 6 [where referred to *Rudagnostus*] Cambrian (Upper) U.S.S.R. (Kazakhstan), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Evansaspis subgen. n. see *Leiostegium*.

Exochops Weller 1936 referred to Phillipsiinae, may be a subgenus of *Griffithides* Portlock 1843, Přibyl.

Eymekops granulosa [*E. granulosa* p. 21] sp. n. p. 77 pl. iii fig. 12, *E. quadrilateralis* sp. n. p. 77 pl. iii fig. 11 Cambrian (Middle) Manchuria, *E. obsoleta* Resser & Endo p. 22, *E. hermias* (Walcott) p. 34, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Eymekops quadr ateralis Endo p. 110, Endo (2).

Fengtienia peculiaris Endo p. 110, Endo (2).

? *Fieldaspis minuta* sp. n. p. 3 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

? *Fieldaspis minuta* Rusc. illustrated p. 17 pl. ii fig. 5, Rusconi (5).

Fisocephalus gen. n. [? Burlingiidae] p. 15 for type *F. expansus* sp. n. p. 16 pl. vi fig. 1, *F. extumidus* sp. n. p. 17 pl. vi figs. 2-3, *F. limbatus* sp. n. p. 17 [unillustr.] Cambrian (Upper) U.S.S.R. (Kazakhstan & Siberia), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Flexicalymene Shirley 1936 referred to Colpocoryphinae subfam. n. p. 225, Hupé (4).

Flexicalymene croneisi (Roy 1941) for *Calymene* c. R. restr. [non fig. 124d] holotype refigured p. 147 pl. lxii figs. 13-15, Whittington (1).

Flexicalymene sp. p. 1988, Fisher.

Flexicalymene recorded p. 1436, Evitt.

Formonia see *Drevermannia*.

Fuchouia manchuriensis (Walcott) — *F. quadrata* Resser & Endo 1937 a synonym p. 61, Endo (1).

Genevievella Lochman 1936 — *Llanoaspis* L. 1938 not a synonym, Resser's 1938 spp. of *G.* referred to *Llanoaspis* [quod vide], *G.* cf. *G. spinosa* L. p. 736 pl. lxxxiii figs. 3, 5, 6, Palmer (1).

Genevievella rogersvillensis Resser type of *Rogersvillia* gen. n. p. 162, Hupé (4).

Genevievellidae see *Rogersvillia* gen. n.

Geragnostidae Howell a synonym of Agnostinae p. 13, Sdzuy.

Geragnostinae discussed p. 88, *Lotagnostus* Whitehouse referred p. 91, Palmer (2).

Geragnostus Howell 1935 discussed p. 88, *G. tumidosus* (Hall & Whitfield) for *Agnostus* t. H. & W. 1877 holotype refigured and variation discussed p. 89 pl. xix figs. 3-4, pl. xx figs. 1-3, 12, 15, *G. brevis* sp. n. p. 91 pl. xix figs. 1-2 Cambrian (Upper) U.S.A. (Nevada), Palmer J. Paleont. 29 1 1955.

Geragnostus Howell 1935 discussed and *Micragnostus* H. 1935 a synonym p. 14, *G. bavaricus* (Barrande 1868) for *Agnostus* b. B. neotype chosen & figured p. 14 pl. ii figs. 49-57, 100-101, text-fig. 8, Sdzuy.

Geragnostus hirundo (Hicks) [of which *G. fritschi* (Holub) may be a synonym] holotype refigured p. 7 pl. i figs. 1-4, *G. maccoyi* (Salter) lectotype chosen and figured p. 8 pl. i figs. 5-6, *G. caducus* (Barrande) [holotype refigured text-fig. 2a] from Shropshire p. 8 pl. i figs. 7-8, Whittard.

Geragnostus aff. *mundus* (Raymond) for aff. *Peronopsis* m. R. 1925 p. 475 pl. vii fig. 1, pl. viii fig. 17, Kobayashi (1).

Geragnostus cf. *G. tumidosus* (Hall & Whitfield) so referred p. 719 pl. lxxvi figs. 4, 6, Palmer (1).

Geragnostus (*Corrugatagnostus*) see *Corrugatagnostus*.

Girvanagnostus Kobayashi 1939 distinction from *Trinodus* doubtful p. 7, Whittard.

Glabrella Lermontova 1940 referred with query to Eodiscidae, *G. ventrosa* Lermontova p. 28 pl. ii figs. 1-4, Lermontova (2).

Gladiatoria gen. n. [Asaphidae (Macropyginae)] p. 201 for type *Macropyge gladiator* Ross Ordovician (Lower) U.S.A. (Idaho), Hupé Ann. Paléont. 41 1955.

Glossopleura — the following Rusconi spp. of *Asaphus* referred: *limbatus* R. 1946, *inxesulcatus* R. 1946, *asperoensis* R. 1952, *acequionensis* R. 1954 p. [2], Rusconi (1).

Glossopleura leona Lochman 1952 (tentatively) and *G.* sp. L. referred to *Sonoraspis* p. 468, Stoyanow & Susuki.

? *Glossopleura pedemontana* sp. n. p. 18 pl. i fig. 15 Cambrian (Middle) Argentina (Mendoza), *G. inexcavata* (R.) and *G. limbata* (R.) p. 8, Rusconi Rev. Mus. Hist. nat. Mendoza 8 1-4 1955.

Glyphaspis Poulsen 1927 referred to Paracoosiinae p. 37, Sdzuy.

Glyphaspis cf. *G. perconcava* Poulsen, *G. sp.* p. 1394, McMannis.

Goldiidae Raymond 1913 a synonym of Scutellidae nom. n. [quod vide], R. & E. Richter (2).

Goniagnostus attenuatus sp. n. p. 2 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Goniagnostus attenuatus Rusc. illustrated p. 28 pl. ii figs. 13-14, Rusconi (5).

Gonioteloides gen. n. [?Bathyuriidae] p. 446 for type *G. monoceros* sp. n. p. 447 pl. vi figs. 17a-b, 18a-b, pl. viii fig. 10, *G. punctatus* sp. n. p. 448 pl. vi figs. 19a-b Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Goniotelus spp. A, B, C, D [undescr.] p. 17, Hintze (1).

Grandagnostus Howell 1935—*Batus nudus* Beyrich [quod vide] cannot be referred p. 926, Howell (2).

Grandagnostus Howell 1935 a synonym of *Leiagnostus* Jaekel 1909 p. 15, Sdzuy.

Granularia Pol. [?Poletayeva] discussed, *G. obrutchevi* P. p. 148 pl. xxi figs. 1, 1a-e, *G. protolenorum* sp. n. p. 148 pl. xxi figs. 2, 2a Cambrian (Lower) U.S.S.R. (Yakutsk), *G. bidjensis* P. and *G. babakovi* P. mentioned p. 147, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Granularia sp. table 1, Zelenov, Zhuravleva & Korde.

Granularidae Pol. [?Poletayeva] discussed p. 147, Lermontova (1).

Gravicalymene Shirley 1936 referred to Colpocoryphinae subfam. n. p. 225, Hupé (4).

Greylockia Raymond 1937 referred to Lecanoplurinae subfam. n. p. 137, Hupé (4).

Griffithides Portlock 1843 referred to Phillipsinae; *Bollandia*, *Paragriffithides* & *Particeps* Reed 1943 considered either synonyms or subgenera p. 411, *Exochops* Weller 1936 may be a subgenus of *G.* p. 410, Přibyl.

Griffithides cf. *barkei* Woodward listed p. 460, Owen & Jones.

Griffithides marginatus sp. n. p. 345 pl. lii figs. 7-8 Carboniferous (Lower) U.S.A. (Ohio), Hyde Bull. geol. Surv. Ohio No. 51 1953.

Griffithides moorei p. 335, Shaw & Bell.

Griffithides pustulosus p. 1437, Huffman.

Griffithidinae Hupé 1953 a synonym of Phillipsinae p. 409, Přibyl.

Hagiorites Kobayashi 1951 referred tentatively to Paracoosiinae p. 37, Sdzuy.

Haniwa sosanensis Kobayashi p. 8, Endo (1).

Hapsiceraurus gen. n. [Cheirurinae] for type *H. hispidus* sp. n. for *Ceraurus pleurexanthemus* of Schuchert 1900 and possibly including *C. cf. horridus* of Roy 1941 Ordovician (? Upper) Canada (Baffin I.) p. 125 pl. lix figs. 1-7, pl. lx fig. 19; *C. horridus* Troedsson 1928 partim (cephalon) referred to *H.* p. 127, Whittington Mem. geol. Soc. Amer. No. 62 1954.

Hardyia metion? of Kindle 1929 may belong to *Lunacrania* gen. n. p. 472, Kobayashi (1).

Harpes bupthalmus Bouč. p. 334, *H. ungula* Barr. p. 347, *H. sp.* p. 367, Horný.

Harpes macrocephalus p. 285, Struve.

Harpes cf. *macrocephalus* (Goldf.), *H. sp.* p. 26, Krömmelbein et al.

Harpes microporus Nov., *H. sp.* p. 314, Chlupáč (1).

Harpes montagnei Barr. p. 219, *H. transiens* B. p. 225, Svoboda & Prantl (1).

Harpes montagnei Hawle & Corda p. 438, Svoboda & Prantl (3).

Harpes ruderalis Hawle & Corda p. 529, Svoboda & Prantl (4).

Harpes ungula (Sternb.) p. 579,
H. cf. u. p. 582, Bouček & Přibyl.

Harpes ungula (Stbg) p. 383,
Svoboda & Prantl (2).

Harpes venulosus Hawle & Corda
with damaged brim p. 121 text-fig.,
Prantl (1).

Harpes venulosus, *H. convexus*, *H. reticulatus* Hawle & Corda spp., *H. cf. dorbignanus* Barr., *H. sp.* p. 153,
Chlupáč (2).

Harpes (s.l.) ind. sp. A. Whittington 1950 listed p. 399, Whittington (2).

Harpoidae taken to include ?
Hypotheticidae, Loganopeltidae, Harpididae, Harpidae and Entomaspidae
p. 253, Hupé (4).

Hausiella see *Housiella*.

Hebediscus Whitehouse 1936 discussed p. 20, *H. ponderosus* sp. n. p. 21 pl. iii figs. 4, 4a, *H. p.*? p. 22 pl. iii fig. 3 Cambrian (Lower) U.S.S.R. (Siberia), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Hebediscus ponderosus Lerm. table 1, Zelenov, Zhuravleva & Korde.

Hemibarrandia triangula sp. n. (which may be the same as *Pronileus illaeniformis* Pompeckj in Wurm 1925) p. 24 pl. iv figs. 95–96, text-fig. 20 Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Hemigyraspis [Raymond 1910] a synonym of *Asaphellus* Callaway 1877 p. 436, Kobayashi (1).

Hemirhodon Raymond may be close to the ancestors of Styginidae p. 24, Skjeseth.

? *Hemirhodon serranus* sp. n. p. 1 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 30 1954.

? *Hemirhodon serranus* Rusc. illustrated p. 36 pl. ii fig. 9, Rusconi (5).

Heterocaryon Raymond 1937 compared with Otarioninae p. 126, Hupé (4).

Highgatella gen. n. ["modified Olenid?"] for type *Terranovella gelasina* Shaw 1951 Ordovician (Tremadoc) [not Upper Cambrian] U.S.A. (Vermont) p. 187, Shaw J. Paleont. 29 1 1955.

Highgatella Shaw 1955 affinities to *Euloma* discussed and referred to Olenidae incertae subfamiliae p. 19, Sdzuy.

Hoekaspiella mendozana, *H. magna*, *H. spinosa* Rusc. spp. p. 8, Rusconi (5).

Holanshania gen. nondescr. for type *H. ninghsiaensis* Tu MS. [nom. nud.] p. 432 text-fig. 4 (drawing), Tu in Lu.

Holcacephalus Resser 1938—*Norwoodina* Lochman 1940 a synonym, *H. cf. H. tenerus* (Walcott) p. 742 pl. lxxxiv fig. 3; *H. granulatus* R. a synonym of *H. tenerus*, Palmer (1).

Holcacephalus see Genus and species undet. 2.

Holometopus törnquisti Moberg & Segerberg 1906 referred with query to *Bronteopsis* p. 19, *H. limbatus* Angelin and *H. nitens* Wiman see Raymondaspis, Skjeseth.

Homagnostus Howell — *Agnostus tumidosus* Hall & Whitfield cannot belong p. 89, Palmer (2).

Homagnostus lochmanae Howell & Duncan p. 1394, McMannis.

Homagnostus cf. *manantialensis* Rusc. p. 9, Rusconi (5).

Homagnostus sp. p. 425, Lu.

Homalonotus aculeatus Koch p. 148 pl. xx figs. 6–7, *H. group armatus* Burmeister p. 148 pl. xx figs. 9–13, pl. xxi fig. 14, cf. *H. perarmatus* Frech [no cf. on pl. expl.] p. 149 pl. xx fig. 8, *H. pradoanus* de Verneuil p. 149 pl. xx figs. 1–4, pl. xxi fig. 16, *H. sp.* p. 150, *H. (Dipleura) simplex* R. & E. Richter p. 150 pl. xx figs. 5 a–b, 14, pl. xxi fig. 15 all from Sahara, Le Maître (2).

Homalonotus cf. *knighti* Konig p. 218, Straw.

Homalonotus sp. p. 19 ff., Krömmelbein et al.

Homalops Remelé 1885 stated to be a junior homonym of an unspecified genus p. 134n, Whittington (1).

Homoglossa Raymond 1912 a synonym of *Bronteopsis* to which its type *Ogygiocaris panderi* Schmidt is referred p. 19, Skjeseth.

Hospes Stubblefield & Bulman 1927 referred to Shumardiidae, *H. nanus* sp. n. p. 29 pl. v figs. 34–39 text-figs. 27 (reconstruction)–30 Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Housia Walcott 1916 referred to Housiinae [quod vide] p. 67, Kobayashi & Ichikawa.

Housia sp. revised assignment of pygidium originally attributed to *Dunderbergia nitida* (Hall & Whitfield) p. 761, Palmer (1).

Housiella [in places spelt *Hausiella*] gen. n. [Ceratopygidae (Housiinae)] for type *Ceratopyge canadensis* Walcott 1912 p. 66 pl. xi fig. 12 (drawing), Kobayashi in Kobayashi & Ichikawa Trans. palaeont. Soc. Japan NS No. 19 1955.

Housiinae [?Ceratopygidae] nov. [recte Hupé] for *Housia* and *Housiella* [or *Hausiella*] gen. n. p. 67, Kobayashi in Kobayashi & Ichikawa Trans. palaeont. Soc. Japan NS No. 19 1955.

Howellaspis Lochman & Denson 1944 a synonym of *Bolaspidella* Resser 1937 [quod vide] p. 739, Palmer (1).

Hsiaoshia gen. n. [Asaphiscidae] p. 91 for type *H. quadrata* sp. n. p. 92 pl. i figs. 18–20 Cambrian (Middle) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Huaquinchaia gen. n. [no family assigned], *H. spinosa* sp. n. p. 2 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Huaquinchaia Rusconi referred to Huaquinchaidae fam. n., *H. spinosa* Rusconi illustrated p. 39 pl. iii fig. 7, Rusconi (5).

Huaquinchaidae fam. n. for *Huaquinchaia* Rusconi p. 39, Rusconi Rev. Mus. Hist. nat. Mendoza 8 1–4 1955.

Huilichia gen. n. [no family assigned], *H. trispinata* sp. n. p. 4 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Huilichia Rusconi 1955 referred to Oryctocephalidae, *H. trispinata* Rusconi illustrated p. 22 pl. i fig. 6, Rusconi (5).

Hungaiinae Raymond 1924 referred to Anomocaridae p. 37, Sdzuy.

Hydrocephalus saturnoides p. 189, Havliček & Šnajdr.

Hypagnostus andinus Rusconi illustrated p. 13 pl. i fig. 12, *H. huilichenensis* Rusconi illustrated p. 29 pl. iii fig. 12, *H. sp.* p. 9, Rusconi (5).

Hypagnostus huilichenensis sp. n. p. 2 [unillustr.] Cambrian (Upper), *H. andinus* sp. n. p. 3 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Hypagnostus parvifrons p. 110 ff., *H. p. mammillatus* p. 116 ff., Spjeldnaes.

Hyperagnostus gen. n. [Agnostidae] p. 474 for type *H. binodosus* sp. n. Ordovician (Lower) Canada (B.C.) p. 475 pl. vii figs. 2–3, pl. ix fig. 4 (drawing), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Hyperbolochilus Ross 1951 referred to Asaphiscidae [or Bathyuridae p. 424], *H. expansus* sp. n. Ordovician (Lower) Canada (B.C.) p. 422 pl. iii fig. 1, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Hypodicranotus salteri [? var. *girvanensis*] (Reed) so referred text-fig. 162 (3) reconstruction, Hupé (4).

Hypodicranotus sp. ind. [for *Remopleurides* sp. Roy 1941] p. 120, Whittington (1).

Hypotheticidae Hupé 1953 referred with query to Harpoidae p. 254, Hupé (4).

Hysterolenus Moberg 1898 referred to Ceratopyginæ p. 67, Kobayashi & Ichikawa.

Hysterolenus? *glabrus* sp. n. p. 32 pl. iii fig. 1, *H.* ? sp. p. 32 pl. iii fig. 2 Cambrian (Upper) U.S.S.R. (Kazakhstan), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Hysterolenus sp. p. 8, Endo (1).

Hysteropleura Raymond 1937 referred to Toxotididae fam. n. p. 135, Hupé (4).

Hysteropleura Raymond 1937 a synonym of *Bolaspidella* Resser 1937 p. 739, Palmer (1).

Hystriculus [recte *Hystricurus*] *granosus* Endo p. 108, Endo (2).

Hystricuridae — *Jeffersonia* referred p. 122, Hupé (4).

Hystricurus *platyleurus* sp. n. p. 454 pl. vi fig. 6, *H.* cfr. *genalatus* Ross p. 454 pl. vi figs. 1–2, *H.* sp. p. 455 pl. vi fig. 8, *H.*? sp. p. 455 Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Hystricurus n. spp. a & b [undescr.] pp. 12–13, Hintze (1).

Hystricurus sp. pl. xxxviii fig. 15, *H.*? sp. pl. xxxviii figs. 16, 18, *H.* aff. *H. missouriensis* Ulrich pl. xxxviii figs. 17, 19–20, *H.* sp. pl. xli figs. 32–33, Cloud & Barnes.

Illaenidae relations to Styginidae via *Protostygina* p. 24, Skjeseth.

Illaenurus eurekensis Walcott referred to *Sympysurina* p. 430, Kobayashi (1).

Illaenus aduncus Jaanusson [nom. nud.] p. 115, *I. sarsi* J. p. 116, *I.* sp. p. 127, *I. glabriusculus* J. [nom. nud.], *I.* cf. *wahlenbergi* (Eichw.) p. 128, Bohlin.

Illaenus americanus p. 765, Weiss.

Illaenus cf. *giganteus* Burm. showing part of presumed intestine p. 16 text-figs. 4 a–b (photographs), c (drawing), Péneau (2).

Illaenus lacertus [spelt *lacterus* on pl. expl.] sp. n. p. 136 pl. lxi figs. 1–6 Ordovician (? Upper) Canada (Baffin I.), *I. baffinlandicus* Roy 1941 lectotype selected and figured pl. lxi figs. 19, 23, *I. b.* R. *partim* (cranium) referred to *I. l.* p. 138; *I.*

milleri Billings 1859 type of *Bumas-tus* (*Bumastoides*) subgen. n. p. 138, *I. punctatus* R. 1941 referred tentatively to *Thaleops* p. 140; *I.* sp. ind. Roy 1941 including *I.* cf. *groenlandicus* of R. 1941 listed p. 121, Whittington Mem. geol. Soc. Amer. No. 62 1954.

Illaenus panderi Barr. p. 3, *I.* sp. p. 4, *I.* cf. *wahlenbergianus* B. p. 9, Röhlisch & Chlupáč.

Illaenus sphaericus Holm p. 237, Martna.

Illaenus aff. *sulcifrons* Holm p. 11 ff. referred to *I. planifrons* n. sp. [nom. nud.] p. 34 postscript, *I.* n. sp. [undescr.] p. 16, *I. excellens* H. p. 17, *I.* cf. *wahlenbergi* (Eichw.) with synonym *I. revaliensis* H. p. 31, JAANUSSON in Jaanusson & Mutvei.

Illaenus wahlenbergianus and cf. w. (Barr.) p. 237, Marek (1).

Illaenus sp. p. 36, Baillie.

Illaenus sp. p. 36, Dupuis.

Illaenus? sp. p. 30 pl. iv fig. 97, Sdzu.

Illaenus (s.l.) ind. sp. for *I.* cf. *bacalatchiensis* of Elles 1922 (p. 145) p. 422 pl. xl figs. 98–99, 103–105, 108, Whittington (2).

Illaenus n. sp. a [undescr.] p. 19, Hintze (1).

Illaenus-like n. gen. n. sp. a [undescr.] p. 17, Hintze (1).

Incaia gen. n. [Trinucleidae] p. 32 for type "*Trinucleus*" *nordenskioldi* Bulman 1931 Ordovician (Middle) Peru, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Inglefieldia Poulsen 1927 discussed p. 5, Rasetti.

Iranaspis King 1937 referred tentatively to Ptychaspidae p. 177, Hupé (4).

Iranella gen. n. [nondescr. 1953] [Parasolenopleuridae] p. 97 for type *Saratogia latefrons* King 1937 text-fig. 102 (5) Cambrian (Upper) Iran, Hupé Ann. Paléont. 41 1955.

Irania King 1937 non de Filippi 1863 renamed *Iranoleesia* nom. n. p. 86, King.

Iranoleesia gen. n. (nom. n. for *Irenaria* King 1937 *non de Filippi 1863*) p. 86, King Geol. Mag. 92 1 1955.

Isidreana gen. n. [related to Phacopidae], *I. tellecheai* sp. n. p. 4 [unillustr.] Ordovician Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 30 1954.

Isidreana Rusconi referred to Phacopidae, *I. tellecheai* Rusc. illustrated p. 57 pl. iv fig. 7, Rusconi (5).

Isidrella gen. n. [related to *Parabolinella*], *I. bispinata* sp. n. p. 1 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Isidrella Rusconi 1955 referred to Olenidae p. 15, *I. bispinata* Rusc. illustrated p. 15 pl. ii fig. 1, Rusconi (5).

Isocolidae Angelin 1854 referred to Solenopleuroidea, and taken to include *Isocolus*, *Cyphoniscus* and tentatively *Pradesia* p. 128, Hupé (4).

Isoteloides? p. 363, Cloud & Barnes.

Isoteloides n. sp. a [undescr.] p. 16, I.? n. sp. b [undescr.] p. 17, Hintze (1).

Isotelus? *granulatus* Troedsson p. 154, Wilson in Fortier.

Isotelus sp. p. 690, Clark & Strachan.

Isotelus sp. p. 761, Weiss.

Isotelus sp. ind. p. 143, Whittington (1).

Isotelus recorded p. 1436, Evitt.

Ithyphoridae [recte Ityphoridae] referred to Trimucleoidea p. 260, Hupé (4).

Jakutus gen. n. [Corynexochidae] for type *Dorypyge quadriiceps* (Rjonsnitzky) p. 105 pl. xv figs. 1, 1a-l, *Jakutus*? sp. [on pl. expl. as Gen. et sp. indet. (J.? sp.)] p. 107 pl. xiv figs. 5-8 Cambrian (Lower) U.S.S.R. (Yakutsk), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Jeffersonia Collison [recte Ulrich] referred to Hystricuridae p. 122, Hupé (4).

Jeffersonia vertical range pl. xiv, J. cf. *J. missouriensis* Collison pl. xlvi fig. 19, *J. granosa* C. pl. xlvi fig. 20, *J.* sp. pl. xlvi fig. 21, *J.* cf. *J. producta* C. pl. xlvi figs. 22-23, Cloud & Barnes.

Jeffersonia? sp. A [undescr.] p. 15, Hintze (1).

Judaiella gen. n. [Corynexochidae] for type *J. vermicula* sp. n. p. 99 pl. xiv figs. 1, 1a Cambrian (Lower) U.S.S.R. (Yakutsk), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Judomia gen. n. [Olenellidae] for type *J. dzevanovskii* sp. n. p. 48 pl. v figs. 2, 2 a-e Cambrian (Lower) U.S.S.R. (Siberia), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Judomia see *Yudomia*.

Jujuyaspis Kobayashi 1936 discussed, *J. keideli* K. proparian condition reaffirmed, *J. harringtoni* sp. n. for *J. keideli* Harrington & Leanza 1952 non Kobayashi suture considered gonatoparian p. 467, *Salteraspis* [recte *Saltaspis*] H. & L. 1952 a synonym of *Jujuyaspis*, *J. borealis* sp. n. Ordovician (Lower) Canada (B.C.) p. 467 pl. vii figs. 12, 13a-b; *J. robusta* Tjernvik 1953 compared with *Acerocare* p. 467, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Jujuyaspis? *robusta* Tjernvik 1953 type of *Nericiaspis* gen. n. p. 210, Tjernvik.

Kainella kindlei sp. n. Ordovician (Lower) Canada (B.C.) p. 413 pl. ii fig. 1, *K. stenorachis* Kobayashi listed p. 366, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Kainellidae Ulrich & Resser 1930 a synonym of Richardsonellidae [quod vide], Kobayashi's 1953 subfamilies criticized p. 25, Szdzy.

Kawina n. sp. a [undescr.] p. 17, Hintze (1).

Kayseraspis Harrington 1938 discussed & referred to Ogygiocarinae p. 442, *K. euclides* (Walcott) for *Xenostegium* e. W. 1925 with synonym *X. albertainum* W. p. 442 pl. iv figs. 4-12, pl. v figs. 8-10, ?22-23 [cfr. *euclides*], *K.*? sp. p. 444 pl. iv figs. 13-14, Kobayashi (1).

Kettneraspis see *Acanthaloma*.

Kingaspis alatus p. 972, **Hupé** (3).

Kingstonia Walcott 1924 — Shaw's division into *K.* (*Kingstonia*) & *K.* (*Ucebia*) accepted, *K.* (*U.*) *pontocensis* Lochman with synonym *K.* *texana* L. p. 725 pl. lxxx figs. 1–4, **Palmer** (1).

Kingstonia gibbosa sp. n. p. 14 pl. iv figs. 1, 1a, 2, 3 Cambrian (Upper) U.S.S.R. (Kazakhstan), **Lermontova** Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Kirkella cfr. *vigilans* (Whittington) p. 445 pl. v figs. 12–17, pl. viii fig. 6, **Kobayashi** (1).

Kirkella n. spp. a, b, f [undescr.] pp. 15–16, **Hintze** (1).

Kloučekia phillipsi (Barr.) p. 237, **Marek** (1).

Kloučekia solitaria (Barr.) p. 6 ff., **Röhlich & Chlupáč**.

Kobayashia Harrington 1938 discussed & referred to *Ogygiocarinae* p. 440, *K. lanceolata* sp. n. Ordovician (Lower) Canada (B.C.) p. 441 pl. iv figs. 1–3, cranidium of *Macropyge gladiator* [Ross] probably belongs to *K.* p. 440, **Kobayashi** J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Kochiella Poulsen 1927 discussed p. 5, **Rasetti**.

Kogenium Kobayashi 1935 a subgenus of *Proceratopyge* p. 67, **Kobayashi & Ichikawa**.

Kogenium ? sp. p. 42, **Endo** (1).

Kolihapeltis see *Scutellum*.

Komaspidae Kobayashi discussed and referred to *Paradoxiida* ord. n. p. 94, **Lermontova** (1).

Kootenia Walcott 1888 discussed p. 122, *K. jakutensis* Lerm. [sp. n.] for *K.* (*Bonnia*?) j. L. 1940 nom. nud. p. 124 pl. xvii figs. 2, 2a–f, *K. magna* sp. n. p. 126 pl. xviii figs. 1, 1a–b, *K. anabrensis* sp. n. p. 128 pl. xviii figs. 2, 2a, *K. solitaria* sp. n. p. 131 pl. xviii fig. 4, *K.* sp. indet. (? *K. a.*) p. 130 pl. xviii figs. 3, 3a Cambrian (Lower) U.S.S.R. (Siberia),

K. grandis sp. nov. [nom. nud.] p. 62, **Lermontova** Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Kootenia incerta Rusc. p. 8, **Rusconi** (5).

Kootenia marcoui (Whitfield) 1884 holotype figured pp. 786, 804 pl. lxxiv figs. 1–4, **Shaw** (2).

Kootenia cf. *K. marcoui* (Whitfield) listed p. 3, **Rasetti**.

Koptura lisani (Walcott) p. 110, **Endo** (2).

Kormagnostus Resser 1938 referred to *Peronopsinae*, *K. simplex* R. with synonyms *K. harlanensis* R. *K. esterius* Lochman & *K. splendens* L. pl. lxxvi figs. 8–12, *Baltagnostus beltensis* L. is congeneric if not conspecific with *K. simplex* p. 718, **Palmer** (1).

Kormagnostus cuchillensis Rusc. p. 30, *K. lanceolatus* R. p. 9, **Rusconi** (5).

Kotuia Kobayashi 1943 referred with query to *Anomocarellidae* p. 100, **Hupé** (4).

Labostria gen. n. [Ptychopariidae] p. 750 for type *L. conveximarginata* sp. n. pl. lxxxvi figs. 1–4, *L. platifrons* sp. n. pl. lxxxvi figs. 6–8, *L. sigmoidalis* sp. n. pl. lxxxvi fig. 5 Cambrian (Upper) U.S.A. (Texas) p. 751; *L. quadrata* (Resser) for *Aphelaspis* q. R. [quod vide] p. 750, **Palmer** J. Paleont. 28 6 1955.

Lachnostoma Ross 1951 referred to *Bathyuridae*, *L.*? sp. p. 449 pl. v fig. 11, **Kobayashi** (1).

Lauzonella Rasetti [misspelt Kasetti] 1944 referred to *Richardsonellidae* p. 150, **Hupé** (4).

Lecanopleura Raymond 1937 referred to *Asaphiscidae* (*Lecanopleurinae* subfam. n. p. 137, **Hupé** (4).

Lecanopleurinae subfam. n. [Asaphiscidae] for *Lecanopleura*, *Greylockia* and *Platydiamesus* p. 137, **Hupé** Ann. Paléont. 41 1955.

Leiagnostus Jaekel 1909 discussed [see also *Phalacroma*], *Grandagnostus* Howell 1935 a synonym, *L. franconicus* sp. n. p. 15 pl. ii figs. 46–47,

? 48, ? 98, text-fig. 9, *L. cf. f.* pl. ii fig. 45 Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Leiagnostus Jaekel 1909—*Battus nudus* Beyrich [quod vide] cannot be referred p. 925, Howell (2).

Leiagnostus cf. *bohemicus* (Novák) p. 12 pl. i fig. 14, Whittard.

Leimitzia subgen. n. see *Ptercephalina*.

Leiostegiidae see *Ordosiinae* subfam. n.

Leiostegiinae — *Lisania* referred p. 161, Hupé (4).

Leiostegium (*Evansaspis*) subgen. n. p. 420 for type *L. (E.) glabrum* sp. n. Ordovician (Lower) Canada (B.C.) p. 421 pl. ii figs. 11–17, *L. formosa* Hintze and tentatively *Crepicephalus ceratopygoides* Raymond also referred to *L. (E.)* p. 421, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Leiostegium n. sp. a [undescr.] p. 14, Hintze (1).

Leiostegium [form with affinities to] p. 144, Cloud & Barnes.

Leiostrototropis Raymond 1937 referred to *Protopliomeropsinae* p. 245, Hupé (4).

Leonaspis sp. listed p. 112, Lawson.

Leonaspis ? recorded p. 1436, Evitt.

Lepidoproetus see *Proetus*.

Lepidoproetus Erben 1951 an independent genus of *Proetinae* p. 181, Hupé (4).

Leptopilus Raymond 1924 referred to *Styginidae* p. 12, Skjeseth.

Leptoplastinae see *Sphaerophthalmella* gen. n.

Levinia simplex sp. n. p. 3 [un-illustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

? *Levinia simplex* Rusc. illustrated p. 20 pl. i fig. 9, *L. isidrensis* R. p. 8, Rusconi (5).

Lichakephalus gen. n. [? Lichidae] for type *L. erbeni* sp. n. p. 28 pl. v figs. 29–33 text-figs. 26a–c Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Lichapype cf. *primula* (Barrande 1868) p. 26 pl. v fig. 28 text-fig. 25, Sdzuy.

Lichas *coelorrhin* Ang. p. 127, Bohlin.

Lichas laxatus of Elles 1922 (p. 145) referred to *Platylichas* ind. sp. p. 424, Whittington (2).

Lichas (*Acanthopyge*) cf. *meridionalis* (Frech) [after record of J. Péneau] p. 17, Pillot (2).

Lichas simplex (Barr.) p. 2, Růžička & Bouška.

Lichas sp. p. 76, Krömmelbein et al.

Lichengia see *Linchangia*.

Lichidae — *Lichakephalus* gen. n. tentatively assigned p. 28, Sdzuy.

Licnocephala Ross 1951 referred to *Bathyuridae*, *L. longa* sp. n. Ordovician (Lower) Canada (B.C.) p. 448 pl. vi fig. 16, pl. viii fig. 13, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Linchangia Kobayashi 1942 [error pro *Lichengia* K. 1942] referred to *Saukiinae* p. 176, Hupé (4).

Linguaphillipsia Stubblefield 1948 referred to *Phillipsiinae* p. 410, Pribyl.

Lingukainella Kobayashi 1953—*Metopolichas* ? *martelli* may belong to *L.* p. 412; *L. robusta* Kobayashi listed p. 366, Kobayashi (1).

Lioparia Lorenz 1906 referred to *Anomocarinae* p. 37, Sdzuy.

Liostracina krausei Monke p. 110, Endo (2).

Liostracina krausei Monke p. 426, Lu.

Liostracina ? *paupiforme* sp. n. p. 78 pl. iv fig. 17 Cambrian (Middle) Manchuria, *L. krausei* Monke p. 44, *L. ? pustulosa* n. sp. [nom. nud.] p. 32, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Lisania Walcott 1911 referred to Leostegiinae p. 161, Hupé (4).

Litagnostus Rasetti 1944 discussed and referred to Pseudagnostinae pp. 87, 92, *L. expansus* sp. n. Cambrian (Upper) U.S.A. (Nevada) p. 92 pl. xix fig. 13, Palmer J. Paleont. 29 1 1955.

Litocodia Resser 1938 should provisionally be restricted to the type *L. typicalis* R. p. 6, Rasetti.

Llanoaspidae see *Arcuolimbus* gen. n.

Llanoaspis Lochman 1938 not a synonym of *Genevievelia* L. 1936 p. 736, *L. modesta* L. (holotype refigured) with following Resser 1938 spp. of *G.* as synonyms *campbelli*, *walcotti*, *blandensis*, *marionensis*, *wallacensis*, *buttsi* p. 737 pl. lxxxii figs. 10, 11, *L. peculiaris* (R.) for *G. p.* Resser p. 737 pl. lxxxii fig. 5, *L. undulata* L. with synonyms *L. montanensis* L. and *G. rogersvillensis* R. p. 738 pl. lxxxii figs. 6-7, *L. undulata* var. *granulata* var. n. Cambrian (Upper) U.S.A. (Texas) p. 738 pl. lxxxii fig. 9, *L. virginica* (R.) for *G. v.* Resser p. 738 pl. lxxxii fig. 8; *L. dorothaea* L. 1944 a synonym of *L. clinchensis* (R.) p. 738, Palmer J. Paleont. 28 6 1955.

Lobococephalina emmrichi (Barr.) p. 186 ff., Havliček & Šnajdr.

Lobopyge branikensis (Barr.) p. 154, *L.?* sp. p. 120, Chlupáč (2).

? *Loganellus incisus* sp. n. p. 2 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Loganellus paramillanus sp. n. p. 2 [unillustr.] Cambrian (? Middle), *L. simplicicostatus* sp. n. p. 2 [unillustr.], *L. ornatus* sp. n. p. 3 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

? *Loganellus paramillanus* Rusc. illustrated p. 16 pl. ii fig. 3, *L. simplicicostatus* R. p. 32 pl. ii fig. 11, ? *L. ornatus* R. p. 33 pl. ii fig. 12, ? *L. incisus* R. p. 33 pl. iii fig. 9, Rusconi (5).

Loganopeltidae Hupé 1953 referred to Harpoidae p. 254, Hupé (4).

Loganopeltis depressa Rasetti text-fig. 237, Hupé (4).

Lonchocephalus Owen 1852 discussed with diagnosis p. 761, *L.?* sp. p. 762 pl. lxxxvii fig. 5, *L. appalachia* Walcott referred to *Boneterrina* [quod vide] p. 726, Palmer (1).

Lonchodus Angelin 1854 referred to Raphiophorinae p. 261, Hupé (4).

Lonchodus — *Ampyx domatus* tentatively referred p. 17, Whittard.

Lonchodus portlocki (Barr.) p. 9, Röhlich & Chlupáč.

Lonchodus rouaulti [sic] (Barr.) so referred p. 320, Horný.

Lopnorites Troedsson 1937 considered a subgenus of *Proceratopyge* [quod vide], *L. fragilis* T. referred to *P. (Proceratopyge)* p. 68 text-fig., Kobayashi & Ichikawa.

Lorenzella lilia sp. n. p. 72 pl. ix figs. 7-9 Cambrian (Upper) Manchuria, *L. ogurai* Resser & Endo p. 19, *L. rotundata* R. & E. p. 10, *L.?* *taitzuensis* E. p. 42, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Lorenzella ogurai Resser & Endo p. 109, Endo (2).

Lorenzella sp. p. 426 ff., Lu.

Lotagnostus Whitehouse 1936 referred to Geragnostinae pp. 87, 91, *L. obscurus* sp. n. Cambrian (Upper) U.S.A. (Nevada) p. 92 pl. xix figs. 5-7, 10, *L. o.?* p. 100, Palmer J. Paleont. 29 1 1955.

Lucracania gen. n. [Shumardiidae] for type *L. trisepta* sp. n. Ordovician (Lower) Canada (B.C.) p. 472 pl. vii fig. 8, pl. ix fig. 10 (drawing), *Hardyia metion* ? of Kindle 1929 may belong to *L.*, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Luxella gen. n. [Ptychopariidae (Antagmina)] p. 20 for type *Ptychoparia lux* Walcott 1917 p. 21 pl. i fig. 4 (drawing), pl. vi figs. 9-11 Canada (British Columbia), *L. crassimarginata* sp. n. p. 22 pl. vi figs. 7-8 Canada (Quebec) [in boulders] Cambrian (Lower), Rasetti Smithson. misc. Coll. 128 7 1955.

Macrobole see *Cyrtosymbole*.

Macrocultites gen. n. [? Emmerichellidae sic] p. 460 for type *M. enigmaticus* [enigmaticum on pl. expl.] sp. n. p. 461 pl. vi fig. 14, pl. ix figs. 6a-b (restored drawings), *M. ?* sp. pl. vi figs. 15 a-b Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Macropyge gladiator Ross type of *Gladiatoria* gen. n. p. 201, Hupé (4).

Macropyge gladiator Ross—craniidium probably belongs to *Kobayashia* p. 440, Kobayashi (1).

Macropyge sica sp. n. p. 26 pl. v figs. 26-27 text-figs. 24a-c Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Macropygidae Kobayashi 1937 discussed and considered provisionally a separate family for *Macropyge* & *Lichapyge* p. 26, Sdzuy.

Macropyginae (Kobayashi 1937) referred to Asaphidae p. 201, see *Gladiatoria* gen. n., Hupé (4).

Maladioidella elongata sp. n. p. 84 pl. viii fig. 12 Cambrian (Upper) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Maladioidella splendens Endo p. 109, Endo (2).

Maladiooides asiaticus Kobayashi p. 9, Endo (1).

Maladiooides asiaticus Kobayashi p. 109, Endo (2).

Manchuriella Resser & Endo 1937 [so dated]—*Psilaspis* R. & E. a synonym p. 88, *M. semicirculare* sp. n. p. 87 pl. iv figs. 3-5, *M. granulosa* sp. n. p. 89 pl. iv figs. 6-7 Cambrian (Middle) Manchuria, *M. ? tumida* R. & E. pygidia and free cheeks ascribed p. 88 pl. iii figs. 16-20, pl. iv figs. 1-2, *M. mina* (Dames) with following R. & E. 1937 spp. of *M.* as synonyms *typa*, *tapingensis*, *distincta*, *hatai* p. 86, *M. subquadrata* (D.) with synonym *Anomocarella macar* Walcott p. 87, *M. temenus* (Walcott) for *A. t. W.* with synonym *Psilaspis manchuriensis* R. & E. [type of *Psilaspis*] p. 87, *M. convexa*

(Endo) for *P. ? c. E.* 1937, *M. sp.* undt. for *Proasaphiscus ephori* of R. & E. 1937 partim (pl. 39 fig. 11) p. 88; *M. prisa* Resser & Endo a synonym of *Ptychoparia orientalis* R. & E. p. 73, *M. angustilimbata* R. & E. of *P. ? grabauui* R. & E. p. 74; *M. sp.* listed with *M. cfr. distincta* R. & E. p. 39, *M. tenuilobrosa* E. p. 43, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Manchuriella convexa (Endo), *M. granulosa* E. p. 110, Endo (2).

Manchurocephalus gen. n. (Dikelocephalidae (Dikelocephalinae)) p. 95 for type *Coosia deprati* Mansuy 1915 [recorded from Manchuria] p. 96 pl. x fig. 12 pars Cambrian (Upper), Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Manchurocephalus departi (Mansui) [sic] p. 109, Endo (2).

Mansuyella concavolimbata [com-cavolimbata on pl. expl.] sp. n. p. 92 pl. viii figs. 13-14 Cambrian (Upper) Manchuria, *M. lilia* Endo p. 9, *M. tokunagai* (Kobayashi) p. 25, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Mansuyella tokunagai (Kobayashi) p. 109, Endo (2).

Maryvillia cf. *M. ariston* Walcott p. 723 pl. lxxix figs. 6-9; *M. hybrida* Resser holotype pygidium an unidentifiable sp. of *Coosella*, cranidium referred to *Blountia nixonensis* Lochman p. 722, *M. widnerensis* R. referred to *Coosella* p. 730, Palmer (1).

Megadunderbergia Kobayashi 1939 [sic] not a distinctive subgenus of *Dunderbergia* Walcott 1924 p. 761, Palmer (1).

Megalaspides dalecarlicus (Holm) p. 118, Bohlin.

Megalaspidiella n. spp. a, b [un-descr.] p. 15, Hintze (1).

Megalaspis acuticauda Ang. p. 81, *M. sp.* text-fig. 1 (2), Hundt.

Megalaspis gigas Ang. lectotype chosen and figured, Norwegian material excluded p. 135 pl. iv figs. 3, 4, text-fig. 7B, *M. aff. g.* pl. iii fig. 9, *M. centaurus* Dalman declared nomen nudum p. 134, *M. c.* of Bohlin 1949 pl. 1 fig. 1 referred to *M.*

obtusicauda sp. n. Ordovician (Lower) Sweden (Öland) p. 131 pl. iv figs. 1, 2, text-figs. 6A-D, 7A, *M. c.* of Schmidt 1906 referred to *M. longicauda* v. Leuchtenberg (which may be identical with *M. gigas*) p. 136, *M. multiradiata* A. and *M. latilimbata* A. considered nomina dubia p. 134, *M. rufis* A. text-fig. 7C and *M. grandis* Sars discussed pp. 134, 137; *M. cf. r.* p. 114, *M. acuticauda* A. p. 116, *M. hyorrhina* v. Leucht. p. 116 pl. iii fig. 10, *M. limbata* var. *lata* Törnq. and ? *M. l.* var. indet. pl. v fig. 1 p. 117, *M. aff. planilimbata* Ang. (=later form of Tjernvik 1952) p. 118, *M. cf. heros* p. 129, *M. sp.* p. 128 pl. iii fig. 8, *M. sp.* text-fig. 7D, Bohlin Bull. geol. Instn Univ. Upsala 35 1955.

Megalaspis gigas Ang. p. 15 ff., *M. obtusicauda* Bohlin p. 30, Jaanusson in Jaanusson & Mutvei.

Megalaspis planilimbata Ang. p. 527 ff., *M. planilimbata* earlier & later forms Tjernvik p. 529, Lindström.

Mendodiscus tuberculatus Rusc. p. 8, Rusconi (5).

Mendogaspis trispinus, *M. quebradensis* Rusc. spp. p. 8, Rusconi (5).

Mendoparabolina brevicauda sp. n. p. 2 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Mendoparabolina brevicauda Rusc. illustrated p. 30 pl. ii figs. 15, ?16 [hypostome tentatively assigned], Rusconi (5).

Meneviella Stubblefield 1951 referred to Conocoryphidae (*Meneviellinae*) subfam. n. p. 113, Hupé (4).

Meneviellinae subfam. n. [Conocoryphidae] for *Meneviella* p. 113, Hupé Ann. Paléont. 41 1955.

Meromonia sp. p. 742 pl. lxxxiii fig. 8, Palmer (1).

Menomoniidae — *Cruzoia* tentatively referred p. 163, Hupé (4).

Mephiarges see *Acanthopyge*.

Mesonacis Walcott 1885 a synonym of *Olenellus* p. 790, Shaw (2).

Metabowmania gen. n. [Emmerichellidae sic] p. 457 for type *M. latilimbata* sp. n. Ordovician (Lower) Canada (B.C.) p. 458 pl. vi fig. 13, pl. viii fig. 9, pl. ix figs. 7a-b (restored drawings), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Metacalymene Kegel 1927 emend. Shirley 1936 referred to Colpocoryphinae subfam. n. p. 225, Hupé (4).

Metacalymene baylei (Barr.) p. 579, Bouček & Fřibyl.

Metacalymene baylei (Barr.) p. 349, Horný.

Metacalymene baylei (Barr.) p. 211, Svoboda & Frantl (1).

Metacalymene baylei (Barr.) p. 383, Svoboda & Frantl (2).

Metacanthus see *Acanthopyge*.

Metagraulos tienshifuensis sp. n. p. 71 pl. i figs. 2-4 Cambrian (Lower) Manchuria, *M. ? dryas* Walcott p. 71 pl. iii figs. 2-4, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Metanomocare Lermontova 1940 a synonym of *Coosia* Walcott 1911 p. 169, Hupé (4).

Metapilekia Harrington 1938 referred tentatively to Pilekiidae fam. n., *M. [bilirata]* attribution of pygidium queried p. 43, Sdzu.

Metapiomerops Kobayashi 1934 referred tentatively to Pilekiidae fam. n. p. 43, Sdzu.

Meteoraspis Resser 1936 [sic] referred to Crepicephalinae p. 139, Hupé (4).

Meteoraspis Resser 1935 referred to Tricrepicephalidae fam. n., *Coelopachys* & *Greylockia* Raymond 1937 accepted as synonyms, *M. cf. M. loisi* Lochman p. 753 pl. lxxxii fig. 1, *M. metra* (Walcott) with synonym *M. bipunctata* L. p. 753 pl. lxxxii figs. 2, 4, *M. cf. M. robusta* L. p. 754 pl. lxxxii fig. 3; several spp. of *Tricrepicephalus* [quod vide] referred to *Meteoraspis* p. 754, Palmer (1).

Metisia Resser 1937 a subjective synonym of *Modocia* Walcott 1924 p. 763, Palmer (1).

Metopolichas ? *martelli* may belong to *Lingukainella* p. 412, Kobayashi (1).

Metoptogyrus Raymond 1937 referred tentatively to Ogygiocarininae p. 196n, Hupé (4).

Micmacca Matthew 1895 discussed, *M.* ? *rara* sp. nov. [sic] for *Prokootenia rara* Lermontova 1940 [type of *Prokootenia* L. 1940] refigured p. 87 pl. xii fig. 7, Lermontova (1).

Micmacopsis Lermontova 1940 discussed and referred to Protolenidae p. 84, *M. redlichoides* L. restr. (pl. 39 fig. 3 non fig. 3a [given erroneously in one place as pl. 39 fig. 13 non fig. 3]) refigured p. 85 pl. xii fig. 5; *M. redlichoides* L. partim (pl. 39 fig. 3a) referred to *Bergeroniaspis ornatus* sp. n. pl. xii fig. 2a, Lermontova (1).

Micragnostus Howell 1935 a synonym of *Geragnostus* p. 14, Sdzuy.

Micraulidae Howell 1937 referred to Agraulidae p. 94, Hupé (4).

Miraspis mira (Barr.) p. 320, *M.* sp. (cheek) p. 376, Horný.

Modocia Walcott 1924 discussed with new diagnosis, *Metisia* Resser 1937 and *Semnocephalus* R. 1942 subjective synonyms, *M.* cf. *M. centralis* (Whitfield) p. 763 pl. lxxxvii fig. 8, *M.* cf. *M. oweni* (Meek & Hayden) p. 763 pl. lxxxvii figs. 3, 4, 6, Palmer (1).

Monstraspis monstrosa (Barr.) p. 388, Svoboda & Prantl (2).

Moxonia [sic] referred to Olenidae p. 462, Kobayashi (1).

Myindidae referred to Utioidea p. 135, Hupé (4).

Myttonia gen. n. [Trinucleidae] for type *M. confusa* sp. n. Ordovician (Lower) Britain (Shropshire) p. 29 pl. iii figs. 5-7, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Namanoia gen. n. [Namanoiidae] for type *N. namanensis* sp. n. [= *Agraulos namanensis* Lerm. 1937 (?MS) nom. nud.] p. 135 pl. xx figs. 1, 1a-j [figs. 1, 1d, 1e forma *lata*,

figs. 1a-b forma *longa* p. 136n] Cambrian (Lower) U.S.S.R., Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Namanoiidae fam. n. [Ptychoparida] for *Namanoia* gen. n. p. 135, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Neoagnostus gen. n. [Agnostidae] for type *N. aspidoides* sp. n. Ordovician (Lower) Canada (B.C.) p. 473 pl. vii figs. 4-5, pl. ix fig. 5 (drawing), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Neoasaphus see *Asaphus*.

Neochilonorria multicostata sp. n. p. 20 pl. i fig. 4 Cambrian (Middle) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 8 1-4 1955.

Neogriphithides Toumansky 1935 referred to Phillipsiinae p. 410, Přibyl.

Neolenus (Matthew) Walcott 1925 discussed with *Olenoides* Meek 1877 partim in synonymy p. 7, *N. inexpectans* Lermontova p. 8 pl. i figs. 6-11, Lermontova (2).

Neolenus ? see *Ceraurus* ?

Neophillipsia Gheyselinck 1937 a synonym of *Ditomopyge* Newell 1931 p. 188, Hupé (4).

Neoproetus Tesch 1923 referred to Phillipsiinae p. 410, Přibyl.

Neotaenicephalus gen. n. [Elviniae] p. 451 for type *N. obsoleta* [obsoletus on pl. expl.] sp. n. Ordovician (Lower) Canada (B.C.) p. 452 pl. vi figs. 12a-b, pl. ix figs. 9a-b (drawings), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Nephranops see *Phacops*.

Nericiaspis gen. n. [Olenidae (Peliturinae)] for type *Jujuyaspis* ? *robusta* Tjernvik 1953 [refigured] Cambrian (Upper) Sweden (Nerike) p. 210 pl. ii figs. 1-4 text-fig. 1B, Tjernvik Geol. Fören. Stockh. Förh. 77 2 1955.

Nieszkowskia ? n. sp. a [undescri.] p. 19, Hintze (1).

Nileidae — *Brachyaspis* Salter 1866 may belong p. 145, Whittington (1).

Nileidae ? gen. et sp. indet. p. 425 pl. v figs. 20–21 Ordovician (Lower) Canada (B.C.), Kobayashi (1).

Nileus armadillo Dalm. illustration of Panderian organs text-fig. 1B, Hupé (1).

Nileus armadillo Dalm. p. 116 ff., Bohlin.

Nileus armadillo (Dalm.) p. 523 ff., Lindström.

Nileus-like sp. A [undescr.] p. 15, Hintze (1).

Nileus-like n. gen. [undescr.] n. spp. a, b, c, d pp. 15–17 [all undescr.], Hintze (1).

Niobe emarginula Ang., N. sp. (aff. *obsoleta* Linn.) Tjernvik p. 527 ff., Lindström.

Niobe frontalis (Dalman) with measurements of lectotype (chosen) p. 143 pl. vi figs. 5–9, text-figs. 9A–B, N. cf. *frontalis* pl. vi fig. 10, N. sp. (cf. *frontalis* sensu Schmidt 1901) p. 148 text-fig. 9C, N. *imparilimbata* sp. n. Ordovician (Lower) Sweden (Öland) p. 149 pl. vi figs. 11–12 [non 10], N. *laeviceps* D. discussed and some records excluded p. 150, N. sp. p. 118, Bohlin Bull. geol. Instn Univ. Upsala 35 1955.

Niobe homfrayi var. *smithi* listed p. 5, Curtis.

Niobe (*Niobella*) *innotata* (Barande 1868) neotype with synonyms *Conocephalites extremus*, *C. discrepans*, ? *C. problematicus*, *Asaphus wirthi*, ? *Trilobites* spp. V., X. & Z. Barande 1868 spp. p. 22 pl. iv figs. 1–21 text-figs. 18 (reconstruction), 19, Sdzu.

Niobe ? n. sp. a [undescr.] p. 15, Hintze (1).

Niobella see *Niobe*.

Niobella selwyni (Salter) recorded p. 17, Whittard.

Norwoodia Walcott 1916—*Whitfieldina* Resser 1937 a synonym, *N. quadrangularis* (Whitfield) p. 743 pl. lxxxiv fig. 1, Palmer (1).

Norwoodiidae referred to Burlingida p. 411, Kobayashi (1).

Norwoodina Lochman 1940 a synonym of *Holcacephalus* Resser 1938 p. 742, Palmer (1).

Odontochile cristata Hawle & Corda, *O. rugosa* H. & C., *O. spinifera* (Barr.), *O. fletcheri* (B.), *O. reussi* (B.) p. 388, Svoboda & Prantl (2).

Odontochile cristata Hawle & Corda p. 539, Svoboda & Prantl (4).

Odontochile rugosa (Hawle & Corda), *O. hausmanni* (Brgrt.), *O. auriculata* (Barr.), *O. cf. reussi* (B.) p. 155, Chlupáč (2).

Odontochile rugosa Hawle & Corda, *O. cf. spinosa* (Barr.) p. 221, Svoboda & Prantl (1).

Odontopleura dufrénoyi Barr., *O. ovata* Emmerich p. 379, Horný.

Odontopleuracea — *Pharostoma* considered not related p. 31, Sdzu.

Odontopleuridae see *Acidaspididae* gen. n.

Odontopleuridae gen. indet. for *Acidaspis hystrix* of Elles 1922 (p. 145) p. 425 pl. xi fig. 119, Whittington (2).

Ogygia dilatata plautoni Schmidt 1904 referred to *Stygina* p. 14, *O. ? concentrica* Linnarsson 1869 to *Bronteopsis* p. 16, *O. c.* of Funquist 1919 to *B. holtedahli* sp. n. p. 17, Skjeseth.

Ogygia guettardi Brogn. p. 81 text-fig. 2, *O. sp.* text-fig. 1 (1), Hundt.

Ogygiocarinae — general discussion of American forms *Bellefontia*, *Asaphellus*, *Xenostegium*, *Trigonocerca*, *Trigonocerella*, *Kobayashia*, *Kayseraspis*, *Columbicephalus* gen. n. [quae vide] p. 434 ff., Kobayashi (1).

Ogygiocaris panderi Schmidt 1904 referred to *Bronteopsis* p. 19, Skjeseth.

? *Ogygopsis isidrensis* Rusc. p. 8, Rusconi (5).

Olenellidae see *Judomia* gen. n.

Olenellidae discussed p. 44, Lemontova (1).

Olenellidae (undetermined) listed p. 3, Rasetti.

Olenellus Billings 1861 discussed and *Mesonacis* Walcott 1885 & *Paedeumus* W. 1910 considered synonyms, *O. brachycephalus* (Emmons) 1860 [type lost] with synonyms *P. transitanus* W. 1910 & *P. perkinsi* Resser & Howell 1938 p. 791 pl. lxxv figs. 1-3, *O. thompsoni* (Hall) 1859 [type missing] with synonyms var. *crassimarginatus* W. 1910 & *O. agellus* R. & H. p. 792 [following records of *O. t.* referred to *O. b.*]—Whitfield 1884, Raymond 1928, Bell 1931 partim, Kindle & Tasch 1948 partim], *O. vermontanus* (H.) 1859 [type missing] with synonym *O. georgiensis* R. & H. and excluding *O. v.* K. & T. 1948 [to *O. b.*] p. 793 pl. lxxv fig. 10, *O. hermani* K. & T. 1948 p. 792, Shaw (2).

Olenellus recorded from Spain, p. 15, *O. bröggeri*? Walcott, *O. ? thompsoni*? *O. vermontana*? p. 19, Sampayo.

Olenellus cf. *thompsoni* Hall 1859 p. 18 pl. ii fig. 10 (partly restored), *O. sp.* I p. 18 pl. ii fig. 5, *O. sp.* II p. 19 pl. ii figs. 6-7 text-fig. 4 (reconstruction) Cambrian (Lower) Spitzbergen, Winsnes.

Olenid? see *Highgatella* gen. n.

Olenidae Burmeister 1843—*Tostonia* and *Moxomia* referred p. 462, Triarthrinae included in Oleninae, Kobayashi (1).

Olenidae—*Isidrella* Rusconi 1955 referred p. 15, *Orkekeia* R. 1955 tentatively referred p. 17, Rusconi (5).

Olenidae incertae subfamiliae—*Euloma*, *Highgatella*, *Pareuloma* & ? *Proaulacopleura* so referred, probably constituting a new subfamily p. 19, Sdzuy.

Olenidae (Oleninae) see *Paraelenus* gen. n.

Olenidae (Oleninae) see *Protocedinia* gen. n.

Olenidae (Triarthrinae) see *Cyclognathina* gen. n.

Oleninae—Triarthrinae emend. Harrington & Leanza a synonym p. 462, Kobayashi (1).

Olenoidae—Sárkiaidae referred p. 150, Hupé (4).

Olenoides Meek 1877 partim in synonymy of *Neolenus* Matthew 1899 p. 7, Lermontova (2).

Olenoides chañariensis sp. n. p. 4 [unillustr.] Cambrian (Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 32 1955.

Olenoides chañariensis Rusc. illustrated p. 22 pl. i fig. 8, Rusconi (5).

Olenoides manchuriensis sp. n. Cambrian (Middle) Manchuria p. 62 pl. iv figs. 8-9, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Olenus frequens Barrande 1868 with synonyms *O. gümbeli* & *O. expectans* B. referred to *Parabolina* [quod vide] p. 15, Sdzuy.

Olenus multicostatus, *O. triangulatus*, ? *O. tellecheai* Rusc. spp. p. 8, Rusconi (5).

Onchocephalus Resser 1937 discussed pp. 6, 16, *O. sulcatus* sp. n. p. 17 pl. i fig. 3 (drawing), pl. iii figs. 16-19, *O. sp.* undet. No. 1 p. 17 pl. iii fig. 20, *O. sp.* undet. No. 2 p. 18 pl. iii fig. 22, *O. sp.* undet. No. 3 p. 18 pl. iii fig. 21 Cambrian (Lower) Canada (Quebec) [in boulders]; *Antagmus solitarius* Lochman & *Proliostracus goodwini* Resser referred to *O. p. 17*, Rasetti Smithson. misc. Coll. 128 7 1955.

Onchopeltis curcunchensis sp. n., ? *O. platycephalus* sp. n. p. 3 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Onchopeltis curcunchensis Rusc. illustrated p. 34 pl. iii fig. 5, ? *O. platycephalus* R. p. 35, Rusconi (5).

Onnia sp. p. 10, ? *O. sp.* p. 51 from Argentina, Rusconi (5).

Ordosia gen. n. [Leiostegiidae (Ordosiinae)] p. 421 (435) for type *O. fimbriata* sp. n. p. 422 (436) pl. i figs. 12-18 Cambrian (Upper) China (Inner Mongolia), Lu Acta paleont. sinica 2 4 1954.

Ordosiinae subfam. n. [Leiostegiidae] for *Ordosia* gen. n. p. 421 (435), Lu Acta paleont. sinica 2 4 1954.

Orkekeia gen. n. [no family assigned], *O. ornata* sp. n. p. 1 [un-illustr.] Cambrian (? Middle) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

Orkekeia Rusconi 1955 referred with query to Olenidae, *O. ornata* Rusc. illustrated p. 17 pl. ii fig. 4, Rusconi (5).

Ormatops [sic] *atavus* (Barr.) p. 211 ff., *O.* sp. p. 213, Havlíček & Šnajdr.

Orometopidae fam. n. [Trinucleoidae] p. 261 for *Orometopus*, Hupé Ann. Paléont. 41 1955.

Orometopus Brögger 1896 referred to *Orometopidae fam. n.* p. 261, Hupé (4).

? *Orria solitaria* Rusc. p. 8, Rusconi (5).

Oryctocephalidae see Aguaraya gen. n.

Oryctocephalidae Beecher discussed, *Neolenus* & *Dorypyge* referred p. 6, Lermontova (2).

Oryctocephalidae — *Huilichia* Rusconi 1955 referred p. 22, Rusconi (5).

Otarion convexum, *O. cornigerum*, *O. barrandei* (H. & C. spp.) listed p. 154, Chlupáč (2).

Otarion diffractum Zenker p. 383, *O. d. nováki* Bouč. p. 385, *O. barrandei* b. (Hawle & Corda) p. 388, *O. advenum* Prantl & Přibyl p. 388, Svoboda & Prantl (2).

Otarion diffractum diffractum Zenker p. 525, *O. convexum* (Hawle & Corda) p. 533, *O. barrandei* (H. & C.) p. 540, *O. (Coignouina) coronata* (Barr.) p. 541, Svoboda & Frantl (4).

Otarion (*Otarion*) *diffractum diffractum* Zenk. p. 580, Bouček & Přibyl.

Otarion (*O.*) *diffractum* Zenker and *d. diffractum* p. 323 ff., *O. (O.)* n. sp. [ex gr. *O. (O.) d.*] [undescr.] p. 360, *O.?* *humillimum* (Barr.) p. 385, *O. sp. (nov.?)* [undescr.] p. 381, *O. sp. indet.* p. 328, Horný.

Otarion diffractum nováki Bouč., *O. schrieli* Keg., *O. advenum* aff. *senior* Ptl & Přib., *O. sp.* p. 315, Chlupáč (1).

Otarion (*Otarion*) *gaultieri* (Rouault) [after record of J. Péneau] p. 17, *O.* sp. [compared with *O. chauffouri* Pillet, *O. advenum* a. Přibyl and *O. diffractum nováki* Bouček] p. 19n, *O. (O.) barrandei* (Corda), *O. (O.) chauffouri* (Pillet), *O. (O.)* cf. g. p. 20, Pillet (2).

Otarion sp. p. 76, Krömmelbein et al.

Paedeumias Walcott 1910 discussed p. 46, *P.* sp. p. 47 pl. v figs. 1, 1a Cambrian (Lower) U.S.S.R. (Siberia), Lermontova (1).

Paedeumias Walcott 1910 a subjective synonym of *Olenellus* p. 790, *P. transians* W. 1910 & *P. perkinsi* Resser & Howell 1938 synonyms of *O. brachycephalus* (Emmons), *P. t.* W. 1910 *partim* (pl. 24 fig. 12, pl. 33 fig. 1, pl. 44 fig. 7) referred to *O. thompsoni* (Hall) p. 793, Shaw (2).

Paedeumias sp. table 1, Zelenov, Zhuravleva & Korde.

Paenebeltella Ross 1951 referred to Pelturinae, *P. convexa* sp. n. Ordovician (Lower) Canada (B.C.) p. 468 pl. vii figs. 21a–b, pl. viii fig. 12, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Pagetia Walcott 1916 (emend. Lermontova 1940) discussed, *P. horrida* sp. n. p. 36 pl. iii fig. 8 Cambrian (Lower) U.S.S.R. (Siberia); *P. annio* Cobbold and *P. vigilans* Matthew referred to *Triangulaspis* Lermontova p. 17, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Pagetia sp. p. 17 pl. ii fig. 4, Winsnes.

Pagetidae Kobayashi 1935 discussed and referred to Dawsonida p. 15, Lermontova (1).

Pagetides amplifrons, *P. elegans*, *P. leiopygus*, *P. minutus*, *P. rupestris* Rasetti spp. listed p. 3, Rasetti.

Pagetides parkeri (Walcott) 1886 of which *P. elegans* Rasetti 1945 considered a synonym pp. 794, 804 pl. lxxiv fig. 13 pars, pl. lxxv figs. 4–9, Shaw (2).

Pagetiellus Lermontova 1940 discussed p. 37, *P. lenaicus* (Toll) p. 38 pl. iv figs. 1, 1a-k, *P. tolli* L. refigured p. 42 pl. iv figs. 2, 2a-d, *P. declivis* sp. nov. [nom. nud.] p. 38, Lermontova (1).

Pagetiellus lenaicus (Toll) *P. tolli* Lerm. table 1, Zelenov, Zhuravleva & Korde.

Pagetina rjonsnitzkii Lermontova refiuged p. 27 pl. iii figs. 7, 7a-b, *P. primaeva* L. refiuged p. 30 pl. iii figs. 5, 5a-c, *P. glabrata* L. refiuged p. 33 pl. iii figs. 6, 6a, Lermontova (1).

Pagodia angustilimbata sp. n. p. 63 pl. viii fig. 15, *P. mina* sp. n. p. 63 pl. ix fig. 5 Cambrian (Upper), *P. subquadrata* sp. n. p. 63 pl. iv figs. 10-12 Cambrian (Middle) Manchuria, *P. buda* Resser & Endo p. 3, *P. paraquadrata* Endo p. 9, *P. sp.* p. 8, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Pagodia divergens Endo, *P. buda* Resser & E. p. 109, Endo (2).

Pagodia sp. p. 429, Lu.

Paishania [recte *Peishania*] *parallela* Endo p. 110, Endo (2).

Paladin Weller 1936 referred to Phillipsiinae, Weberides Reed 1942 and probably *Vidria* W. 1944 synonyms p. 409, Přibyl.

Paladin mucronatus p. 1437, Huffman.

Paladin from Nevada pp. 2241, 2247, Dott.

Panarchaeagonus Öpik 1937 see *Protarchaeagonus* gen. n.

Panderia sp. p. 237, Martna.

Papillicalymene Shirley 1936 referred to Calymeninae p. 226, Hupé (4).

Parabolina frequens (Barrande 1868) for *Olenus* f. B. neotype chosen with synonyms *O. gümbeli* & *O. expectans* B. p. 15 pl. iii figs. 58-61, 762, 63-70 text-fig. 10 (reconstruction), Sdzuy.

Parabolinella see *Isidrella* gen. n.

Parabolinella bisulcata sp. n. Ordovician (Lower) Canada (B.C.) p. 463 pl. vii figs. 18-19, Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

? *Parabolinella pentacantha* sp. n. p. 1 [unillustr.] Cambrian (Middle) Argentina, Rusconi Bol. paleont. B. Aires No. 31 1955.

? *Parabolinella pentacantha* Rusc. illustrated p. 15 pl. ii fig. 2, Rusconi (5).

Paracedariidae fam. n. (nom. n. for Pilgrimiidae Hupé 1953) p. 131, Hupé Ann. Paléont. 41 1955.

Paracoldinioidia [recte *Parakoldinioidia*] *typicalis* Endo p. 109, Endo (2).

Paracoosiinae Kobayashi 1950 referred to Anomocaridae and enlarged to include *Paracoosia*, *Pterocephalia*, *Glyphaspis*, *Pterocephalina*, and tentatively *Birmanites*, *Tropydopyge* & *Hagiorites* p. 37, Sdzuy.

Paracybeloides gen. n. [Cybelidae] p. 251 for type *Cybele loveni* var. *girvanensis* Reed Ordovician (Upper) Britain (Scotland) text-fig. 236 (1) reconstruction, Hupé Ann. Paléont. 41 1955.

Paradoxida ord. n. for Paradoxidae and Komaspidae p. 94, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Paradoxidae Kobayashi referred to Paradoxida ord. n. p. 94, Lermontova (1).

Paradoxides paradoxissimus p. 107 ff., *P. rugulosus* p. 115, Spjeldnaes.

Paradoxides rugulosus Hawle & Corda, *P. minor*, *P. gracilis* (Boeck), *P. lyelli* Barr., *P. sacheri* Barr. p. 184 ff., Havliček & Šnajdr.

Paradoxides ? sp. p. 27 pl. ii fig. 12, Lermontova (2).

Paradoxides recorded p. 973, Hupé (3).

? *Paradoxides* p. 81, Hundt.

Paragriffithides Reed 1943 either a synonym of or a subgenus of *Griphithides* Portlock 1843 p. 411, Přibyl.

Parahomalonotus gervillei (de Verneuil) p. 17, Pillet (2).

Parahystricurus ? sp. p. 455 pl. vi fig. 7; *P. carinatus* Ross possible reference of Ross's 1951 Pygidium genus and species undetermined (pl. 19 figs. 6, 11, 15) p. 456, Kobayashi (1).

Parahystricurus n. sp. a [undescr.]
p. 15, Hintze (1).

Parakoldinioidea see *Paracoldinioidea*.

Parakoldinioidea typicalis Endo
p. 7, Endo (1).

Paralejulus see *Scutellum*.

Paralejurus see *Scutellum*.

Paramansuyella granulosa Endo,
P. planilimbata E., *P. glabra* E., *P.*
puteata E. p. 109, Endo (2).

Paramansuyella puteata Endo, *P.*
planilimbata E. p. 8, Endo (1).

Paramansuyia planilimbata Endo
p. 8, *P. sp.* p. 38, Endo (1).

Paramicmacca gen. n. [Protolenidae] for type *P. siberica* sp. n.
p. 89 pl. xii figs. 8, 8a-d Cambrian
(Lower) U.S.S.R. (Siberia), Lermontova
Lower Cambrian trilobites and
brachiopods from Eastern Siberia,
1951.

Paraoelenus gen. n. [Olenidae (Oleninae)] for type *P. papilionaceus* sp. n.
p. 17 pl. iv figs. 4-9 Cambrian
(Upper) U.S.S.R. (Kazakhstan), Lermontova
Upper Cambrian trilobites and
brachiopods from Boshche-Kulya, 1951.

Parapilekia Kobayashi 1934 discussed & considered a subjective synonym of *Pilekia* Barton 1915 p. 44, Sdzuy.

Parapilekia Kobayashi (a sp. near to *P. olesnaensis* Růžička) recorded from Tremadoc of Morocco p. 1593, Choubert, Hindermeyer & Hupé.

Paraplethopeltis depressa Bridge & Cloud holotype refigured pl. xxxviii figs. 1-3, 10, *P. obesa* B. & C. types refigured pl. xxxviii figs. 4-9, 11-13, *P. ?* pl. xxxviii fig. 14, Cloud & Barnes.

Paraplethopeltis n. spp. a & b [undescr.] p. 13, Hintze (1).

Parasolenopleuridae see *Iranella* gen. n.

Paraulacopleura see *Aulacopleura*.

Pareuloma Rasetti 1954 referred with *Euloma* and others to Olenidae incertae subfamiliae p. 19, Sdzuy.

Pareuloma Rasetti referred to Eulominae subfam. n. p. 449, Kobayashi (1).

Particeps Reed 1943 either a synonym of or a subgenus of *Griffithides* Portlock 1843 p. 411, Přibyl.

Peishania see *Paishania*.

Peishania parallela sp. n. p. 66 pl. vi figs. 12-17 Cambrian (Middle) Manchuria, *P. convexa* Resser & Endo p. 33, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Peltura minor Brögger p. 529, Lindström.

Peltura pacifica sp. n. p. 465 pl. vii figs. 14-17, *P. canadensis* sp. n. p. 466 pl. vii fig. 20 Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Pelturinae — *Paenebeltella* Ross 1951 referred p. 468, Kobayashi (1).

Pelturinae see *Nericiaspis* gen. n., tentative relationships within subfamily text-fig. 2, Tjernvik.

Pemphigaspis inexpectans Lochman p. 764 pl. lxxxix figs. 2, 4, 6, Palmer (1).

Pemphygaspis [sic] Hall 1863 referred to Raymondinidae p. 128, Hupé (4).

Perimetopus Resser 1937 should be restricted to the type *P. arenosus* (Billings) p. 7, Rasetti.

Perimetopus arenosus (Billings) 1861 with synonym *P. secundus* Resser 1937 p. 796, Shaw (2).

Periomma Resser 1937 discussed and referred to Antagmina p. 6, 24, *P. walcotti* R. holotype refigured p. 24 pl. i fig. 6 (drawing), pl. v figs. 9-14, *P. gaspensis* sp. n. Cambrian (Lower) Canada (Quebec) [in boulders] p. 25 pl. iv figs. 11-15, Rasetti Smithson. misc. Coll. 128 7 1955.

Periomma Resser 1937—*Periomma* R. 1938 considered a synonym p. 796, *P. typicalis* R. 1937 with synonym *Periomma yorkensis* R. 1938 pp. 797, 804 pl. lxxiv fig. 10, Shaw (2).

Periommella Resser 1938 referred to *Ptychopariidae* (*Periommellinae*) subfam. n. p. 28, *P. yorkensis* R. 1938 from Quebec p. 29 pl. i figs. 8-9 (drawings), pl. v figs. 1-8, **Rasetti**.

Periommella Resser 1938 considered a synonym of *Periomma*, since its type *P. yorkensis* R. is considered a synonym of *Periomma typicalis* R. p. 797, Shaw (2).

Periommellinae subfam. n. [Ptychopariidae] for *Periommella* Resser 1938 p. 28, **Rasetti** Smithson. misc. Coll. 128 7 1955.

Perischodory grandgei Raymond p. 421 pl. ix fig. 11 (drawing), **Kobayashi** (1).

Permoproetus Toumansky 1935 excluded from *Phillipsiinae* but not reassigned p. 411, **Přibyl**.

Peronopsisinae—*Baltagnostus* Lochman and *Kormagnostus* Resser referred p. 718, **Palmer** (1).

Peronopsis fallax ferox p. 114, **Spjeldnaes**.

Peronopsis integer integer (Barr.), *P. integer spinosa* (Pomp.) p. 184 ff., **Havliček & Šnajdr**.

Peronopsis munda Raymond 1925 referred to *Geragnostus* p. 475, **Kobayashi** (1).

Phacopid (resembling *Trimeroccephalus*) p. 136, **Edgett**.

Phacopidae see **Bouleinae** subfam. n.

Phacopidae see *Isidreana* gen. n.

Phacopidella referred to *Dalmaniinae*, *P. (Dienstina)* discussed p. 63, *P. (D.) enkia* sp. n. for *P. sp. aff. limaria* of R. & E. Richter 1926 (pl. 11 fig. 15) Devonian (Upper) Germany (Rhineland) p. 52 pl. i figs. 4a-d, 5b-c, pl. ii fig. 17 (reconstruction), *P. (Ductina)* discussed p. 69, **R. & E. Richter** Senck. leth. 36 1-2 1955.

Phacopidella (Ductina) ductifrons p. 227 ff., *P. (D.) sp.* p. 241, **Rabien**.

Phacopidella misera (Barr.) p. 315, **Chlupáč** (1).

Phacopidella prantli Růžička, *P. sp.*, *P. (Denckmannites)* [sic] *micromata* Röm. p. 224, **Svoboda & Prantl** (1).

Phacopidella trapeziceps (Barr.) p. 579, **Bouček & Přibyl**.

Phacopidella trapeziceps (Barr.) p. 326 ff., *P. glockeri* (B.) p. 379, **Horný**.

Phacopidella trapeziceps (Barr.) p. 526, *P. misera* (B.) p. 531, *P. (Denckmannites) micromata* (Roem.) p. 546, **Svoboda & Prantl** (4).

Phacopinae—relations of Upper Devonian forms p. 56 text-fig. 1, see also *Phacops*, **R. & E. Richter** (1).

Phacops (*Phacops*) Upper Devonian forms grouped into *breviceps*-group (including only *koeneni*, but *cryphoides* may belong), *granulatus*-group (*granulatus*, *circumspectans*, *wedekindi*, possibly *pentops*), *latifrons*-group (*accipitrinus*, *a. maretiolensis*, *cornelius*) p. 57; *P. (Nephronops)* discussed and derived from *breviceps*-group of *P. (Phacops)* p. 57; *P. (Cryphops)* classified into *cryptophthalmus*-group (*cryptophthalmus* range & distribution discussed, *acuticeps*), *schlosseri*-group (*schlosseri* sp. n. [see below], *pulvinifer*), ? *ensae*-group (*ensae*, *wocklumeriae*, *tripartitus*) [this group may be an independent off-shoot from *P. (Phacops)*] p. 58 ff., *P. (Cryphops) schlosseri* sp. n. Devonian (Upper) Germany (Thuringia) p. 50 pl. i figs. 1a-d, 2, pl. ii fig. 16 (reconstruction), *P. (C.) pulvinifer* (Matern 1927) holotype refigured p. 52 pl. i figs. 3a-d; *P. (Trimeroccephalus)* discussed and derived from *cryptophthalmus*-group of *P. (Cryphops)* p. 62, *P. (T.) mastophthalmus* (Reinh. Richter) pl. i figs. 6-8; *P. (Dianops)* discussed and derived from *schlosseri*-group of *P. (Cryphops)*, *P. (D.) limbatus* range and relations with *P. (D.) bartzschi* Pfeiffer discussed p. 62, *P. (D.) sp.* pl. ii fig. 14; relations of U. Devonian subgenera of *Phacops* text-fig. 1, **R. & E. Richter** Senck. leth. 36 1-2 1955.

Phacops (*P.*) *accipitrinus accipitrinus* (Phillips 1841) including *P. (P.) granulatus* of Reed 1944 p. 46, Goldring.

Phacops bronni (Barr.) p. 438, **Svoboda & Prantl** (3).

Phacops communis fecundus Barr. p. 527, *P. cf. hoeningshausi* [sic] B.; *P.*

cf. becki (B.) p. 534, *P. sternbergi* B. p. 540, *P. fecundus superstes* B. p. 541, Svoboda & Prantl (4).

Phacops cf. confluens R. & E. Richter p. 154 pl. xxi figs. 1-2, *P. fecundus major* Barrande p. 155 pl. xx figs. 22-23, *P. menchikoffi* sp. n. Devonian (Middle) p. 155 pl. xx figs. 15-21, pl. xxi fig. 10, *P. potieri* Bayle p. 156, *P. schlotheimi* Bronn p. 156 pl. xxi figs. 3-5 [Sahara], 6 [Eifel], *P. salteri* Kozłowski [cf. on pl. expl.] p. 157 pl. xxi fig. 9, *P. cf. turco* R. & E. R. p. 157 pl. xxi figs. 7-8 all from Algeria (Sahara), Le Maître Matér. Carte géol. Algér. [1] No. 12 1952.

Phacops cristata var. *pipa* Hall p. 184, Kindle & Eidman.

Phacops cryphoides ?, *P. sp.* p. 240, *P. (subgen.?) sp.* p. 242; *P. (Phacops) koeneni* p. 242, *P. (P.) cf. koeneni* p. 236; *P. (Oryphops) cryptophthalmus* horizon discussed p. 188, *P. (C.) acuticeps* R. & E. R. ?, *P. (C.?)* p. 227, *P. (C.?) ensae*, *P. (C.?) wockumeriae* p. 229; *P. (Dianops) griffithides* p. 225, *P. (D.) sp.* p. 234, *P. (D.) anophthalmus* near *griffithides* p. 247; *P. (Nephranops) incisus* *dillanus* R. & E. R. p. 227, *P. (N.)?* p. 228; *P. (Trimeroccephalus)* sp. p. 228, *P. (T.) mastophthalmus* p. 231, Rabien.

Phacops downingiae p. 7, Curtis.

Phacops (P.) aff. fecundus (Barrande), *P. (P.) sp.*, *P. (subgen.?) emarginatus* (B.) ? p. 21, Pillet (2).

Phacops (Phacops) fecundus communis Barr. p. 581, Bouček & Přibyl.

Phacops fecundus communis Barr. p. 353, Horný.

Phacops fecundus communis Barr. p. 383, *P. f. degener* B. p. 388, *P. bronni* B., *P. cf. boecki* B. p. 387, *P. sternbergi* B. p. 388, *P. (Reedops) cephalotes* Hawle & Corda p. 388, Svoboda & Prantl (2).

Phacops fecundus communis Barr. mut. [undescr.] p. 211, *P. cf. hoeninghausi* B. p. 219, *P. f. degener* B. p. 221, *P. f. superstes* B. p. 223, Svoboda & Prantl (1).

Phacops latifrons (Bronn), *P. laticomes* n. sp. R. & E. Richter [nom. nud.] p. 311, *P. sp.* p. 314, Struve.

Phacops latifrons p. 103, *P. sp.* p. 22 ff., *P. n. sp.* [undescr.] (related to *P. l.*) p. 83 ff., *P. n. sp.* [undescr.] p. 111, Krömmelbein et al.

Phacops rana milleri frontispiece, La Roque & Marple.

Phacops sternbergi, *P. signatus* (Hawle & Corda spp.), *P. intermedius*, *P. fecundus major*, *P. emarginatus* Barr. spp., *P. (Reedops) cephalotes* (H. & C.) p. 155, Chlupáč (2).

Phacops sp. p. 83, Hundt.

Phaetonellus ? sp. p. 154, Chlupáč (2).

Phätonides striatus precedens Bouč. p. 211, Svoboda & Prantl (1).

Phalacroma Corda 1847—smooth forms usually attributed should be referred to *Leiagnostus* p. 15, Sdzuý.

Phalacroma — smooth Ordovician Agnostids should probably not be referred p. 13, Whittard.

Phalacroma Hawle & Corda 1847—considered debatable whether *Battus nudus* Beyrich (= *P. scutiforme* H. & C.) or *Agnostus bibullatus* Barrande should be considered the type species, and thought best to refer *B. nudus* to *Phalagnostus* gen. n. p. 926, Howell (2).

Phalacroma nudum Corda p. 186 ff., Havlíček & Šnajdr.

Phalagnostus gen. n. [Agnostidae] for type *Battus nudus* Beyrich 1845 Cambrian (Middle) Bohemia p. 926, Howell J. Paleont. 29 5 1955.

Pharostoma Corda 1847 discussed & referred to Calymenidae, considered not related to Odontopleuracea p. 31, Sdzuý.

Pharostoma pulchrum (Barr.) p. 3ff., Röhlich & Chlupáč.

Pharostoma n. sp. [undescr.] p. 240, Martna.

Pharostom[at]idae Hupé 1953 a synonym of Calymenidae, *Euloma* & *Calymenopsis* being removed p. 30, Sdzuý.

Pharostomina gen. n. [Calymenidae] for type *P. öpiki* sp. n. p. 31 pl. ii fig. 99, pl. vi figs. 62–75 text-figs. 31–32, *P. ferentaria* sp. n. possibly including *Trilobites* sp. Y. Barrande 1868 p. 33 pl. ii fig. 80, pl. vi figs. 77–79, 81–88 text-figs. 33a–d (reconstruction), *P.* sp. p. 34 pl. vi fig. 76 Ordovician (Tremadoc) Germany (Hof); *Pilekia trapezoidalis* Harrington 1938 probably belongs to *Pharostomina* p. 31, **Sdzuy** Abh. senckenb. naturf. Ges. No. 492 1955.

Phillipsella Oehlert 1886 an objective synonym of *Phillipsinella* Novák 1886, suppression proposed p. 284, Whittington (3).

Phillipsia Portlock 1843 placed on Official List of Generic Names p. 27, *P. kellyi* [correction of *kellii*] P. 1843 spelling discussed p. 41, *P. jonesii* P. 1843 (spelling discussed p. 40) designated to be type of *Cummingella* Reed 1942 pl. i figs. 1a–c (lectotype), 2a–c, Opinion 352.

Phillipsia cabralensis sp. n. p. 288 text-fig. 2 Carboniferous (Lower) Spain (Asturias), Linares Rodríguez Estud. geol. Inst. Mallada No. 12 1950.

Phillipsia hicksi Whidborne 1896 restr. (pl. 2 fig. 5) referred to *Cyrtosymbole* p. 32, *P. h.* W. partim (pl. 2 fig. 8) tentatively to *C.* (*Macrobole*) *duodecimae* R. & E. Richter p. 32 and partim (pl. 2 figs. 6, 7) to *Piltonia salteri* gen. et sp. n. p. 42, *P. kassini* Weber 1937 also referred to *Piltonia* p. 41, Goldring.

Phillipsia kirgisica Web. p. 689, Einor.

Phillipsia pustulata (Phillips) p. 172, *P.* sp. p. 179, Oswald.

Phillipsia? sp. p. 85, S. A. NORTHROP in Kelley & Silver.

Phillipsiinae (Oehlert 1886) Přibyl 1946 discussed with synonyms *Griffithidinae*, *Ditomopyginiae* & *Anisopyginiae* Hupé 1953; subfamily taken to include *Ameura*, *Anisopyge*, *Cummingella*, *Cyphinioides*, *Delaria*, *Ditomopyge*, *Eocyphinium*, *Exochops*, *Griffithides*, *Linguaphillipsia*, *Metaphillipsia*, *Neogriffithides*, *Neoproetus*, *Paladin*, *Phillipsia*, *Paraphillipsia*, *Pseudophillipsia*, ? *Bollandia*; *Permoproetus* excluded p. 409 ff., Přibyl.

Phillipsinella Novák 1886 so dated [rather than 1885] proposed addition to Official List of Generic Names, *Phillipsella* Oehlert 1886 [quod vide] an objective synonym p. 284, Whittington (3).

Phillipsinella parabola (Barr.) p. 10, Röhlich & Chlupáč.

Piazella Lochman 1947 discussed p. 6, Rasetti.

Pilekia Barton 1915 referred to Pilekiidae fam. n., *Parapilekia* Kobayashi 1934 a synonym, *P. discreta* (Barrande 1868) neotype for *Cheirurus discretus* B. with possible synonym *C. gracilis* B. 1868 p. 44 pl. viii figs. 16–19 text-figs. 40a–c, *P. anzia* sp. n. p. 45 pl. viii figs. 20–25, 26–30, ?35 text-figs. 41 (reconstruction), ?44–45, *P.* sp. [may belong to *P. d.* or *P. a.*] pl. viii figs. 31–34 text-figs. 42, 43, 46 Ordovician (Tremadoc) Germany (Hof); *P. trapezoidalis* Harrington 1938 referred tentatively to *Pharostomina* gen. n. p. 31, **Sdzuy** Abh. senckenb. naturf. Ges. No. 492 1955.

Pilekiidae fam. n. [Cheiruracea] for *Pilekia*, *Anacheirurus*, *Tessellacauda*, ? *Metapiomerops*, ? *Metapilekia* p. 42, Pilekiidae probably ancestral to most Cheiruracea p. 44, **Sdzuy** Abh. senckenb. naturf. Ges. No. 492 1955.

Pilgrimiidae Hupé 1953 renamed Paracedidae nom. n. p. 131, Hupé (4).

Piltonia gen. n. [no family assigned, compared with *Waribile*, *Brachymetopus*, *Cordania*] p. 41 for type *P. salteri* sp. n. including *Phillipsia hicksi* Whidborne 1896 partim (pl. 2 figs. 6–7) Carboniferous (Lower) England (Devon) p. 42 pl. ii figs. 8–13 text-figs. 3a–c, 6a–b; *Phillipsia kassini* Weber 1937 referred to *Piltonia* p. 41, Goldring Senck. leth. 36 1–2 1955.

Piriproetus Erben 1952 an independent genus of Proetinae p. 181, Hupé (4).

Placoparia tourneminei Rouault p. 36, Dupuis.

Placoparia zippei tumida Klouč. p. 211, Havliček & Šnajdr.

Plataspella n. sp. [undescr.] p. 1515, Wilson (1).

Platycalymene Shirley 1936 referred to Colpocoryphinae subfam. n. p. 225, Hupé (4).

Platycolpus [form resembling] p. 286, Cloud & Barnes.

Platydiamesus Raymond 1937 referred to Lecanopleurinae subfam. n. p. 137, Hupé (4).

Platylidas ind. sp. for *Lichas laxatus* of Elles 1922 (p. 145) p. 424 pl. xl figs. 113–118, Whittington (2).

Platypeltoides crofti [sic] Callaway recorded from Tremadoc of Morocco p. 1593, Choubert, Hindermeyer & Hupé.

Plethagnostus Clark 1923 a synonym of *Pseudognostus* Jaekel 1909 p. 720, Palmer (1).

Plethagnostus jarillensis Rusc. p. 30, Rusconi (5).

Plethometopus p. 181, Cloud & Barnes.

Plethopeltis see N. gen.

Pliomera Fischeri (Eichw.) p. 114 ff., P. cf. f. pl. iii fig. 2, Bohlin.

Pliomeridae — *Protopliomerops* & *Tesselacauda* referred pp. 414, 417, Kobayashi (1).

Pliomerops n. spp. a & b [undescr.] p. 19, Hintze (1).

Pliomerops [form with affinities to] p. 363, Cloud & Barnes.

Polytomurus Corda 1847 [so attributed] suppressed by ICZN in favour of *Dionide* Barrande 1847 p. 453, Opinion 350.

Polytomurus formosa (Barr.) p. 237, Marek (1).

Porterfieldia Cooper 1953 referred tentatively to Raymondinidae p. 128, considered related to *Triarthrus* p. 156, Hupé (4).

Poulsenia Resser 1936 referred to Antagminae and provisionally restricted to Greenland forms p. 5, *P. grönwalli* (Poulsen) see *Solenopleura grönwalli*, Rasetti.

Pradesia Thoral 1935 referred tentatively to Isocolidae p. 129, *P. martyi* T. text-fig. 130 (2) drawing, Hupé (4).

Prionopeltis archiaci (Barr.) p. 581, *P. striatus striatus* (B.) p. 582, Bouček & Přibyl.

Prionopeltis archiaci (Barr.) p. 527, P. sp. p. 543, Svoboda & Prantl (4).

Prionopeltis striatus (Barr.) p. 383, Svoboda & Prantl (2).

Prionopeltis striatus & *P. sp.* cf. *striatus* (Barr.) pp. 354, 334, *P. sp.* p. 338, *P. archiaci* (B.) p. 346, Horný.

Prionopyge Harrington & Leanza 1942 considered a subgenus of *Proceratopyge* p. 67, Kobayashi & Ichikawa.

Proasaphiscus granulatus sp. n. p. 90 pl. vi fig. 11, *P. planilimbatus* sp. n. p. 90 pl. iv figs. 18–20, pl. v figs. 1–3, *P. quadraticaudatus* sp. n. p. 91 pl. v figs. 4–7 Cambrian (Middle) Manchuria; *P. planus* Resser & Endo 1937a synonym of *P. centronatus* R. & E. p. 89, *P. ephori* of R. & E. 1937 partim (pl. 39 fig. 11) referred to *Manchuriella* sp. undt. p. 88, *P. sp.* R. & E. 1937 referred to synonymy of *Aojia reflexa* sp. n. p. 64; *P. ephori* (Walcott) listed p. 21, *P. quadrilateralis* R. & E. p. 21, *P. conoideus* R. & E. p. 12, *P. sp.* p. 12, *P. humilis* R. & E. p. 22, *P. yabei* R. & E. p. 24, *P. mantouensis* R. & E. p. 30, *P. cfr. m.* p. 48, *P. machidai* E. p. 34, *P. affluens* R. & E. p. 36, *P. willisi* R. & E. p. 48, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Proasaphiscus quadraticaudatus Endo, *P. yabei* Resser & E. p. 110, Endo (2).

Proaulacopleura Kobayashi 1936 referred tentatively to Olenidae incertae subfamiliae [quod vide] p. 19, Sdzuy.

Proceratopyge Wallerius 1895 discussed and referred to Proceratopyginae subfam. n., *P. (Proceratopyge) liaotungensis* sp. n. Cambrian (Upper) Manchuria (Liaotung) p. 69 pl. xi figs. 1–9, following spp. also referred to *P. (P.)—nathorsti* Westergård 1922, *similis* W. 1947, *magnicauda* W. 1948, *lata* & *nectans* Whitehouse 1939, *fragilis* Troedsson 1937 [for *Lopnorites* f. T.] text-fig.

(reconstruction) p. 68; *P.* (*Kogenium*) Kobayashi 1935 so referred; *P.* (*Lopnorites*) T. 1937 so referred & taken to include also *grabaui* T. 1937, *tullbergi* Westergård 1922, *rutellum* [sic] & *polita* Whitehouse 1939 p. 68; *P.* (*Prionopyge*) Harrington & Leanza 1942 so referred p. 67, Kobayashi & Ichikawa Trans. palaeont. Soc. Japan NS No. 19 1955.

Proceratopyginae subfam. n. (Ceratopygidae) for *Proceratopyge* [quod vide] and ? *Ceratopeltis* p. 67, KOBAYASHI in Kobayashi & Ichikawa Trans. palaeont. Soc. Japan NS No. 19 1955.

Prochuangia imamurai sp. n. p. 69 pl. x fig. 12 pars Cambrian (Upper) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Prochuangia imamurai Endo p. 109, Endo (2).

Proerbia prisca Lermontova refigured p. 109 pl. xvi figs. 1, 1a, Lermontova (1).

Proetid p. 136, Edgell.

Proetina latimargo Přib. p. 154, Chlupáč (2).

Proetinae — *Drevermannia* Richter referred p. 504, Přibyl & Plas.

Proetus affinis Bouč., *P.* sp. p. 314, Chlupáč (1).

Proetus (*P.*) *affinis* Bouč. p. 212, *P.* (*P.*) *aff. tuberculatus* Barr. p. 213, *P.* (*P.*) cf. *koeneni* Maurer, *P.* (*P.*) *bohemicus* B. p. 215, *P.* (*P.*) *unguloides* B., *P.* (*Cornuproetus*) *lepidus* (B.), *P.* (*C.*) *dufresnoyi* (B.) p. 219, Svoboda & Prantl (1).

? *Proetus altepinus* sp. n. p. 4 [unillustr.] Ordovician Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 30 1954.

Proetus (*P.*) *bohemicus* (Hawle & Corda), *P.* (*P.*) *koeneni* Maurer, *P.* (*P.*) *myops*, *P.* (*P.*) *retroflexus*, *P.* (*P.*) *orbitatus*, *P.* (*P.*) cf. *glandiferus*, *P.* (*P.*) *lusor*, *P.* (*P.*) *tuberculatus* Barr. spp., *P.* (*P.*) *microphthalmus* Nov., *P.* (*P.*) sp., *P.* (*Cornuproetus*) *buchi* (H. & C.), *P.* (*C.*) *complanatus* (B.), *P.* (*C.*) cf. *pictus* (Gieb.), *P.* (*C.*) cf. *dufresnoi*

(H. & C.), *P.* (*C.*) sp., *P.* (*Sculptoproetus*) *sculptus* B., *P.* (*Lepidoproetus*) sp., *P.* (*Eremiproetus*) *eremita*, *P.* (*E.*) *natator* B. spp., *P.* (*Unguliproetus*) *unguloides*, *P.* (*U.*) sp. [n. sp. on p. 149] aff. *ryckholti*, *P.* (*U.*) *serus* B. spp., *P.* (*U.*) sp. listed pp. 153–154, *P.* (*Lepidoproetus*) *lepidus* (B.) p. 151, *P.* (*L.*) cf. *kegeli* Erben p. 131, Chlupáč (2).

Proetus folliceps Hall & Clarke p. 184, Kindle & Eidman.

Proetus (*Proetus*) *guerangeri* (Oehlert et Davoust) p. 17, *P.* sp. p. 20, Pillet (2).

Proetus koeneni Maur. p. 438, Svoboda & Prantl (3).

Proetus mořinensis Přibyl p. 524, *P.* *affinis* Bouček p. 530, *P.* (*Eremiproetus*) *complanatus* & cf. c. Barr., *P.* (*E.*) cf. *eremita* B. p. 533, *P.* (*Cornuproetus*) *sculptus* Barr. p. 539, Svoboda & Prantl (4).

Proetus orbitatus Barrande p. 146 pl. xxi fig. 19, *P.* group *bohemicus* B. p. 147 pl. xx figs. 27–29, pl. xxi fig. 20 from Sahara, Le Maître (2).

Proetus pichypuelchensis sp. n. p. 47 pl. v fig. 7 Ordovician (Lower) Argentina (Mendoza), *P.* *altepinus* R. illustrated p. 59 pl. iv fig. 9, Rusconi Rev. Mus. Hist. nat. Mendoza 8 1–4 1955.

Proetus ryckholti Barr. p. 383, Svoboda & Prantl (2).

Proetus ryckholti Barr. & aff. r. p. 349ff., *P.* sp. p. 334, *P.* *mořinensis* Přibyl p. 362, Horný.

Proetus (*Proetus*) *ryckholti* Barr., *P.* (*Cornuproetus*) *intermedius* B. p. 581, *P.* (*C.*) *venustus* B. p. 582, Bouček & Přibyl.

Proetus sp. (near *ryckholti* Barr.), *P.* sp. (near *decorus* Barr.) p. 1, Růžička & Bouška.

Proetus tenuimargo Rud. Richter p. 89, *P.* sp. p. 23ff., *P.* sp. (cuvieri group) p. 28, Krömmelbein et al.

Proetus (*Proetus*) *tenuimargo* Richter p. 312, Struve.

Proetus sp. p. 1988, Fisher.

Proetus sp. listed p. 112, Lawson.

Prokootenia Lermontova 1940—implied probable synonymy with *Micmacca* Matthew 1895 [quod vide] to which its type *P. rara* L. is tentatively referred p. 87, Lermontova (1).

Proliostracus Poulsen 1932 discussed p. 5, *P. goodwini* Resser referred to *Onchocephalus* p. 17, Rasetti.

Pronileus illaeniformis Pompeckj in Wurm 1925 [nom. nud.] may be *Hemibarrandia triangula* sp. n. p. 25, Sdzuy.

Proparia incertae familiae see *Curiaspis* gen. n.

Prosaukia? *orientalis* Kobayashi p. 109, Endo (2).

Prosaukia recorded p. 2055, Flower.

Prosaukiinae — *Stenosaukia* Raymond 1937 probably belongs p. 175, Hupé (4).

Protarchaeonus gen. n. [Familia incerta, compared with *Panarchaeonus*] for type *P. moreffi* sp. n. p. 40 pl. vii figs. 2-?5, ?6-7 [pygidia attributed], text-figs. 36a-b (reconstructions) Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Protillaenus Raymond 1937—*Blountina* Lochman 1944 considered a synonym, *P.* spp. [pygidia] showing possible sexual dimorphism p. 723 pl. lxxix figs. 2, 3, 5, Palmer (1).

Protohedinia gen. n. [Olenidae (Oleninae)] for type *P. distincta* [disticta on pl. expl.] sp. n. p. 79 pl. iv fig. 13, *P. quadrata* sp. n. p. 80 pl. iv figs. 14-16 Cambrian (Middle) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Protolenida ord. n. for Protolenidae p. 51, Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Protolenidae Lermontova MS [so accredited] discussed & taken to include *Protolenus*, *Bergeroniellus*, *Blayacina*, *Micmacca*, *Micmaccopsis*, and *Bergeroniaspis*, *Paramicmacca*, *Anabaraspis* gen. n. p. 51, Lermontova (1).

Protolenidae lumachelle pl. xii fig. 4, Lermontova (1).

Protolenus Matthew 1892 discussed p. 53, *P. dzevanovskii* sp. n. p. 54 pl. vi figs. 1, 1a-f, pl. vii figs. 1, 1a-i, *P. grandis* sp. n. p. 59 pl. viii figs. 1, 1a-f Cambrian (Lower) U.S.S.R. (Siberia), Lermontova Lower Cambrian trilobites and brachiopods from Eastern Siberia, 1951.

Protolenus sp. p. 972, Hupé (3).

Protopeltura praecursor (Wester-gård) text-fig. 1A, Tjernvik.

Protoplomerops Kobayashi 1934 referred to Phomeridae, *P. subquadратus* sp. n. p. 414 pl. ii figs. 3-4, *P. radiatus* sp. n. p. 416 pl. ii figs. 5a-b, 6, *P. longispinus* sp. n. p. 417 pl. ii fig. 7 Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Protoplomerops n. spp. a, b, c [undescr.] p. 15, Hintze (1).

Protoplomeropsinae — *Strototropis*, *Leiostrototropis*, ? *Tesselacauda* and *Pseudocybele* referred p. 245, Hupé (4).

Protopresbynileus Hintze 1954 referred to Asaphinae, *P.* ? aff. *willdeni* (Hintze) p. 446 pl. v figs. 18-19, pl. viii fig. 15, Kobayashi (1).

Protostygina see *Stygina*.

Protypus hitchcocki (Whitfield) 1884 cast of missing holotype figured p. 799 pl. lxxiv fig. 9, Shaw (2).

Protypus marginatus Rasetti, *P. typicus* (Resser) listed p. 3, Rasetti.

Prozacanthoides sp. indet. p. 799 pl. lxxiv fig. 15, Shaw (2).

Prozacanthoides sp. undet. listed p. 3, Rasetti.

Psalikilus n. sp. a [undescr.] p. 15, *P.* sp. A [undescr.] p. 16, Hintze (1).

Pseudagnostidae see *Pseudorhaptagnostus* gen. n.

Pseudagnostinae discussed p. 92, *Litagnostus* Rasetti referred p. 87, Palmer (2).

Pseudagnostus Jaekel 1909—*Plethagnostus* Clark 1923 and *Rhapatagnostus* [sic] Whitehouse 1936 considered synonyms, Troedson's interpretation of pygidial axial furrows supported, *P. communis* (Hall &

Whitfield) p. 720 pl. lxxvi figs. 1-3, *P.? nordicus* (Lochman) [but may represent new genus] for "*Agnostus*" n. L. with synonym "A." *valentinus* L. p. 721 pl. lxxvi figs. 5, 7, Palmer (1).

Pseudagnostus Jaekel 1909 discussed and Kobayashi's interpretation of the posterior part of the pygidial axial lobe upheld p. 93, *P. communis* (Hall & Whitfield) 1877 ontogeny of pygidium described and *Agnostus neon* H. & W. [cotypes figured] tentatively a synonym p. 94 pl. xix figs. 16, 19-21, pl. xx figs. 4-11, 14, *P. convergens* sp. n. showing cephalic muscle scars p. 96 pl. xix figs. 14-15, pl. xx fig. 13, *P. laevis* sp. n. p. 97 pl. xix figs. 8-9, 11-12 Cambrian (Upper) U.S.A. (Nevada), *P. prolongus* (H. & W.) 1877 both cotype cephalata [one described by H. & W. as pygidium] figured p. 98 pl. xix figs. 17, 18, 22, *P. p.?* p. 100, Palmer J. Paleont. 29 1 1955.

Pseudagnostus cyclopygeformis (Sun) p. 9, Endo (1).

Pseudagnostus cyclopygeformis (Sun) p. 109, Endo (2).

Pseudagnostus douvillei Bergeron 1899—*Agnostus koerferi* Monke and probably *A. pii* Airaghi synonyms p. 90, Kobayashi (2).

Pseudagnostus obsoletus sp. n. p. 10 pl. ii figs. 8-10 Cambrian (Upper) U.S.S.R. (Kazakhstan); *P. orientalis* Kobayashi referred to *Pseudorhaptagnostus* gen. n. p. 12, Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Pseudagnostus orientalis Kobayashi p. 65, Kobayashi & Ichikawa.

Pseudagnostus recorded p. 426, Lu.

Pseudasaphus persstriatus sp. n. p. 138 pl. v figs. 3-5, pl. vi figs. 1-2, text-fig. 8B, *P. duplicatus* sp. n. p. 141 pl. v figs. 2, 7, pl. vi figs. 3-4, text-fig. 8A Ordovician (Lower) Sweden (Öland), ? *P. sp.* p. 114 pl. v fig. 6, ? *P. globifrons* (Eichw.) p. 115, Bohlin Bull. geol. Instn Univ. Upsala 35 1955.

Pseudasaphus tecticaudatus (Steinh.) p. 11 ff., *P. sp.* p. 15, JAANUSSON in Jaanusson & Mutvei.

Pseudoasaphus [sic] *globifrons* Eichw. illustrations of Panderian organs text-fig. 3, Hupé (1).

Pseudobasilicus nobilis (Barr.) p. 4, Röhlich & Chlupáč.

Pseudocybele Ross 1951 referred to Protopliomeropsinae p. 245, Hupé (4).

Pseudocybele n. spp. a & b p. 16, Hintze (1).

Pseudokainella ? sp. A [undescr.] p. 12, *P.?* n. sp. b [undescr.] p. 13, Hintze (1).

Pseudokoldinioidea gen. n. [Shumardidae] for type *P. granulosa* sp. n. p. 72 pl. ix fig. 6 Cambrian (Upper) Manchuria, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Pseudolisia Kobayashi 1935 a subjective synonym of *Cheilocephalus* Berkey 1898 [quod vide], *P. raaschi* & *P. texana* Lochman synonyms of *C. brevirostris* (Walcott) p. 759, Palmer (1).

Pseudopetigurus? *globulus* sp. n. p. 40 pl. vii figs. 8-10 text-figs. 37-39 Ordovician (Tremadoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Pseudorhaptagnostus gen. n. [Pseudagnostidae] for type *P. simplex* sp. n. p. 12 pl. ii figs. 11-17, pl. i fig. 1 pars r U.S.S.R. (Kazakhstan), *P. punctatus* sp. n. p. 13 [unillustr.] U.S.S.R. Cambrian (Upper); *Pseudagnostus orientalis* Kobayashi referred to *Pseudorhaptagnostus*, Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Psilaspis Resser & Endo in Kobayashi 1935 a synonym of *Manchuriella* R. & E., *P. manchuriensis* R. & E. being a synonym of *M. temenus* (Walcott) p. 88, *P. convexa* Endo 1937 referred to *M. sp.* 88, Endo (1).

Psilaspis (*Entorachis*) subgen. n. p. 94 for type *Anomocare alcione* Walcott 1913 and including *Ptychoparia memor* Reed 1910, *P. (Entorachis) shantungensis* sp. n. p. 95 pl. xiv

figs. 1–4 Cambrian (Middle) China (Shantung), Kobayashi Trans. palaeont. Soc. Japan NS No. 20 1955.

Psychopyge elegans G. & H. Terrier [type of *P.*] may be a pygidial fragment of *Coronura* p. 151 n., Le Maitre (2).

Pterocephalia Roemer 1849 discussed & referred to *Ptychopariidae* p. 751, *P.* cf. *P. occidens* Walcott p. 752 pl. lxxxvi figs. 9–10, pl. lxxxvii figs. 1–2, Palmer (1).

Pterocephalia Roemer 1849 referred to *Paracoosiinae* p. 37, Sdzuy.

Pterocephalia sanctisabae Roemer cast of syntype refigured pl. xxxviii figs. 25–26, Cloud & Barnes.

Pterocephalia fragments p. 1515, Wilson (1).

Pterocephalina Resser 1938 referred to *Paracoosiinae*, *Dikelocephalus celticus* Salter 1866 probably belongs to *Pterocephalina*; *P.* (*Leimitzia*) subgen. n. for type *Conocephalites bavaricus* Barrande 1868 neotype p. 37 pl. vii figs. 89–97, 101 text-figs. 35a (reconstruction)—c Ordovician (Tre-madoc) Germany (Hof), Sdzuy Abh. senckenb. naturf. Ges. No. 492 1955.

Pterocephalus asiaticus Walcott p. 10, Endo (1).

Pterygometopus calicephalus Green p. 33, Baillie.

Pterygometopus sp. p. 127, Bohlin.

Ptychagnostus (*Triplagnostus*) *gibbus* p. 107 ff., *P. punctuosus* p. 109, *P.* sp.? p. 114, *P. atavus* p. 118, Spjeldnaes.

Ptychagnostus pichum Rusc. p. 9, Rusconi (5).

Ptychaspidae — *Iranaspis* tentatively assigned p. 177, Hupé (4).

? *Ptychaspis bicostatus* sp. n. p. 3 [unillustr.] Cambrian (Upper) Argentina (Mendoza), Rusconi Bol. paleont. B. Aires No. 31 1955.

? *Ptychaspis bicostatus* Rusc. illustrated p. 35 pl. iii fig. 2, Rusconi (5).

Ptychaspis striata recorded p. 2055, Flower.

Ptychaspis pygidium listed p. 460, Okulitch & Bell.

Ptychoparella Poulsen 1927 should be restricted to the type species and Lower Cambrian forms excluded p. 7; *P. taylori*, *P. minor* & [?] *P. walcotti* Resser spp. referred to *Eoptychoparia* gen. n. p. 14, Rasetti.

Ptychoparella discussed p. 779, *P. teucer* (Billings) 1861 of which *P. georgiensis* Resser 1937 [cast figured] a synonym p. 800 pl. lxxiv figs. 11–14, *P. kindleai* R. 1937 p. 800; *P. billingsi* and *P. vermontensis* R. 1937 synonyms of *Billingsaspis adamsii* p. 780, *P. swantonensis* R. 1937 of *P. walcotti* R. which is referred to *Billingsaspis* p. 781, Shaw (2).

Ptychoparia adamsii and *P. vulcanus* see *Billingsaspis*, following records of both spp. excluded: Walcott 1886 (& 1891) pl. 26 figs. 1c [to *Ptychoparella teucer*], 4 [to *Periomma typicalis*], 4a [to *Antagmus? simplex*], Matthew 1897 pl. 3 figs. 2a–b, Walcott 1912 [to *P. typicalis*] p. 779, Shaw (2).

Ptychoparia ezekanovskii Toll referred to *Triangulaspis* Lermontova p. 17, *P. bella* Rjonsnitzky to *Solenopleurella* [quod vide] p. 133, Lermontova (1).

Ptychoparia [misspelt *Ptychopria*] *fengtienensis* sp. n. p. 73 pl. i fig. 1 Cambrian (Lower) Manchuria, *P. orientalis* Resser & Endo 1937 with synonyms *Elrathia manchuriensis* R. & E. and *Manchuriella prissa* R. & E. p. 73, *P. grabaui* R. & E. with synonym *M. angustilimbata* R. & E. p. 74, *P. kochubei* Walcott p. 11, *P.* cfr. *orientalis* p. 17, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Ptychoparia lux Walcott type of *Luxella* gen. n. p. 20, Rasetti.

Ptychoparia memor Reed 1910 referred to *Psilaspis* (*Entorachis*) subgen. n. p. 94, Kobayashi (2).

Ptychoparia orientalis Resser & Endo p. 110, Endo (2).

Ptychoparia striata (Emmr.) p. 185 ff., Havliček & Šnajdr.

Ptychoparida see *Namanoiidae* fam. n.

Ptychoparidae see *Eulominae* sub-fam. n. and *Elviniinae*.

Ptychopariidae — discussion of Lower Cambrian genera from North America p. 4 ff., *Antagmina* Hupé a subfamily p. 8, *Periomellinae* subfam. n. p. 28, Rasetti.

Ptychopariidae see *Blandicephalus*, *Dytremacephalus* and *Labiostria* genn. n.

Ptychopariinae—*Agraulopsis* Růžička 1939 referred tentatively p. 108, Hupé (4).

Ptychopyge excavato-zonata Ang. p. 116 pl. v fig. 8, *P. limbata* A. suggested that sp. be neglected p. 140, Bohlin.

Quadraticephalus calchas (Walcott) p. 109, Endo (2).

Quadraticephalus ? minus sp. n. p. 96 pl. viii figs. 16–17 Cambrian (Upper) Manchuria, *Q. ? calchas* (Walcott) p. 8, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Raaschella ornata Lochman p. 764 pl. lxxxix figs. 7–9, *Terranovella bristolensis* Resser referred to *Raaschella*, Palmer (1).

Rananasus vertical range pl. xiv, *R. conicus* Cullison pl. xlvi figs. 10–15, *R. aff. R. brevicephalus* C. pl. xlvi figs. 16–18, Cloud & Barnes.

Raphiophoridae classified into Raphiophorinae and Ampyxininae subfam. n. p. 261, Hupé (4).

Raphiophoridae discussed p. 14, see also *Cnemidopyge* gen. n., Whittard.

Raphiophorinae newly as a subfamily of Raphiophoridae for *Raphiophorus*, *Lonchodus* and *Ampyx* p. 261, Hupé (4).

Raphiophorus see *Raphiophorus*.

Raphiophorus Angelin 1854 referred to Raphiophorinae p. 261, Hupé (4).

Raphiophorus tenellus (Barr.) p. 10, Röhlich & Chlupáč.

Raphiophorus sp. [meraspid stages, probably representing a new sp.] p. 23 pl. ii figs. 13–16, Whittard.

Raymondaspis Přibyl 1949 discussed with diagnosis & referred to Styginidae p. 20, *R. limbatus* (Angelini 1854) p. 21 pl. iv figs. 2, 4–9, pl. v figs. 6, 8, *R. nitens* (Wiman 1906) lectotype selected & figured p. 22 pl. iv figs. 1, 3, *R. gregarius* (Raymond 1920) [for *Bronteopsis* g. R.] and *R. ardmillanensis* (Reed 1904) [for *B. a.* Reed] p. 23, *R. angelini* (Billings) and *R. planus* (Raymond) p. 12 so referred, Skjeseth.

Raymondella Reed 1935 referred to Ampyxininae subfam. n. p. 262, Hupé (4).

Raymondinidae — *Pemphigaspis* and tentatively *Porterfieldia* referred p. 128, Hupé (4).

Reacalymene Shirley 1936 referred to Colpocoryphinae subfam. n. p. 225, Hupé (4).

Reacalymene—possible attribution of *Calymene croneisi* Roy and *C. fayettensis* Slocum p. 148, Whittington (1).

Redlichia chinensis Walcott 1913—*R. manchuriensis* Resser & Endo and *R. murakamii* R. & E. considered synonyms p. 60, Endo (1).

Redlichia chinensis Walcott p. 111, Endo (2).

Redlichia noetlingi (Redl.) hypostome and ventral sutures described p. 130 ff. text-figs. 1 (reconstruction of cephalon)—3 [drawings]; *R. idonea* Whitehouse may be a synonym of *R. forresti* Etheridge p. 131, Schindewolf.

Reedocalymene Kobayashi 1951 referred to Calymenidae (Reedocalymeninae) subfam. n. p. 227, Hupé (4).

Reedocalymeninae subfam. n. [Calymenidae] p. 227 for *Reedocalymene* and *Calymenesun*, Hupé Ann. Paléont. 41 1955.

Reedolithus carinatus — record of Thorslund 1948 (p. 347) considered doubtful p. 46 n, L. F. Størmer in Hagemann & Spjeldnaes.

Reedops see *Phacops*.

Remipyga gen. n. [Cheirurinae] p. 127 for type *R. glabra* sp. n. p. 128 pl. lix figs. 8, 10–12, pl. lx figs. 1–4 Ordovician (? Upper) Canada (Baffin

I.) ; *Ceraurinus marginatus* Barton 1913 [type of *C.*] may be congeneric with *R. g.* p. 128, *C. icarus noduliferous* [sic] Roy 1941 (refigured) may be conspecific with *R. g.* p. 130 pl. lix fig. 9; *R. icarus* (Billings), *R. meekanus* (Miller), *R. daedalus* (Cox) [enlarged to include several of Troedsson's 1928 specimens], *R. ? platycanthus* (Bradley) all so referred and discussed p. 130, Whittington Mem. geol. Soc. Amer. No. 62 1954.

Remopleuridae — close affinities with Richardsonellidae such as *Apatocephalus* suggest that the families may be united into a superfamily p. 25, Sdzu.

Remopleurides salteri [? var. *girvanensis*] Reed referred to *Hypodiscranotus* text-fig. 162 (3), Hupé (4).

Remopleurides sp. Roy 1941 referred to *Hypodiscranotus* sp. ind. p. 120, Whittington (1).

Remopleurides sp. p. 129, Bohlin.

Remopleurididae — reference to Asaphoidae suggested tentatively p. 701n, Hupé (1).

Rhamphopyge gen. n. [family uncertain] p. 472, *R. altipolum* sp. n. p. 473 pl. vi figs. 9a-b, pl. ix figs. 8a-b (drawings) Ordovician (Lower) Canada (B.C.), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Rhapatagnostus [sic] Whitehouse 1936 a synonym of *Pseudagnostus* Jaekel 1909 p. 720, Palmer (1).

Raphiophorus [sic] *portlocki* (Barr.) p. 237, Marek (1).

Richardsonellidae Raymond 1924 discussed, Kainellidae a synonym, Kobayashi's 1953 subfamilies [of Kainellidae] considered not sharply differentiated, close affinities of R. with Remopleuridae (not with Dikecephalidae), *Apatocephalus* referred to R. p. 25, Sdzu.

Richardsonellidae — *Lauzonella* referred p. 150, Sárkiidae considered descended from Richardsonellidae p. 151, Hupé (4).

Rimouskia Resser 1938—Hupé's assignment to Saoidae accepted p. 30, *R. typica* R. with synonym *R.*

spinosa R. [both holotypes refigured] p. 31 pl. i fig. 10 (drawing), pl. vi figs. 1-6, Rasetti.

Rogersvillia gen. n. [Genevievellidae] p. 162 for type *Genevievella rogersvillensis* Resser Cambrian (Upper) U.S.A., Hupé Ann. Paléont. 41 1955.

Rudagnostidae fam. n. for *Rudagnostus* and *Eurudagnostus* genn. n. p. 7, Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Rudagnostus gen. n. [Rudagnostidae] p. 7 for type *Agnostus rutilus* Salter, *R. brevispinus* see *Eurudagnostus* ? b., Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Saltaspis see *Salteraspis*.

Saltaspis sp. [? for *Jujuyaspis* sp. Tjernvik 1953] text-fig. 1D, Tjernvik.

Salteraspis [recte *Saltaspis*] Harrington & Leanza 1952 considered a synonym of *Jujuyaspis* Kobayashi 1936 p. 467, Kobayashi (1).

Salterolithus cf. *harnagensis* Bancroft 1929 p. 420 pl. xl figs. 94-96, 100-101 text-fig. 6 (reconstruction), Whittington (2).

Saoidae Hupé — assignment of *Rimouskia* Resser accepted p. 30, Rasetti.

Saratogia latefrons King 1937 type of *Iranella* gen. n. p. 97, Hupé (4).

Sárkiidae referred to Olenoidae, probably descended from Richardsonellidae p. 151, Hupé (4).

Saukia ? *orientalis* Resser & Endo p. 7, Endo (1).

Saukia ulrichi Resser & Endo, *S. ? orientalis* R. & E. p. 109, Endo (2).

Saukiinae vertical range pl. xiv, Cloud & Barnes.

Scharyia micropyga (H. & C.) p. 581, Bouček & Přibyl.

Scharyia micropyga (H. & Cda) p. 314, Chlupáč (1).

Scharyia micropyga (Hawle & Corda) p. 151, Chlupáč (2).

Scharyia micropyga (H. & C.) p. 352, Horný.

Schistometopus Resser 1938 referred to Solenopleurellinae p. 107, Hupé (4).

Schizoproetus onyx (Rud. Richter)? p. 23 ff., Krömmelbein et al.

Sculptoproetus Erben 1951 an independent genus of Proetinae p. 181, Hupé (4).

Scutellidae see *Craigheadia* gen. n.

Scutellidae see Scutelluidae nom. n.

Scutellidae — relations to Styginiidae [quod vide] p. 24, Skjeseth.

Scutelluidae nom. n. (for Scutellidae R. & E. Richter 1925 non Gray 1825) — emendation of family name proposed ; Bronteidae Corda 1847, Goldiidae Raymond 1913 and Eobronteidae Sinclair 1949 synonyms p. 291, R. & E. Richter Senck. leth. 36 3-4 1955.

Scutellum (*Scutellum*) *gervillei* (Barandré) p. 21, Pillet (2).

Scutellum haidingeri (Barr.), *S. partschi* (B.) p. 581, Bouček & Přibyl.

Scutellum haidingeri (Barr.), *S. partschi* (Barr.) p. 352, *S. planum* (B.) p. 377, Horný.

Scutellum cf. *haidingeri* Barr. p. 383, *S. lepidum* Bouč. p. 385, *S. (S.) porosum* (B.), *S. (Paralejurus) brongniarti* (B.) p. 388, Sloboda & Prantl (2).

Scutellum (*S.*) cf. *lepidum* Barr. p. 212, *S. (S.) přibyli* Prantl p. 213, *S. (S.) cf. conspersum* (P.) p. 215, *S. (S.) cf. palifer* (Beyr.) p. 216, *S. (S.) angusticeps* Barr., *S. (S.) sieberi* B., *S. (Thysanopeltis) speciosum* (Hawle & Corda) p. 219, Sloboda & Prantl (1).

Scutellum paliferum (Beyr.), *S. bohemicum* Ptl & Přib., *S. schöbli* (Nov.), *S. oblongum* (Hawle & Corda), *S. sp.* [n. sp. on p. 151] aff. *umbeliferum* (Beyr.), *S. viator*, *S. angusticeps*, *S. angusticeps inermis*, *S. rhinoceros*, *S. transversum*, *S. validum*, *S. setosum*, *S. sieberi*, *S. indocilis*, *S. cf. infaustum*, *S. spiniferum*, *S. asperulum*, *S. porosum*, *S. pustulatum*, *S. coelebs*, *S. elongatum*, *S. formosum* (Barr. spp.), *S. (Kolihapeltis) brevifrons* (B.), *S. (Paralejulus) campaniferum*

(Beyr.), *S. (P.) dormitzeri* (H. & C.), *S. (P.) hawlei* (Barr.), *S. (Thysanopeltis) speciosum* (H. & C.) listed p. 153, section of lumachelle of *S. paliferum* pl. v, *S. cf. přibyli* Ptl p. 151, Chlupáč (2).

Scutellum partschi (Barr.) p. 2, Růžička & Bouška.

Scutellum planum (Barr.) p. 526, *S. lepidum* Bouček p. 530, *S. umbelifer* [sic] (Beyr.) p. 531, *S. indocilis* (Barr.), *S. viator* (Barr.) p. 534, *S. cf. sieberi* (Barr.) p. 535, Sloboda & Prantl (4).

Scutellum umbelliferum (Beyr.), *S. přibyli* Ptl, *S. lepidum* Bouč. p. 314, Chlupáč (1).

Scutellum sp. p. 26, Krömmelbein et al.

Selenopeltis buchi (Barr.) p. 212, Havliček & Šnajdr.

Selenopeltis buchi (Barr.) p. 4 ff., Röhlich & Chlupáč.

Semnocephalus Resser 1942 a subjective synonym of *Modocia* Walcott 1924 p. 763, Palmer (1).

Serrodiscus bellimarginatus (Shaler & Foerste 1888) p. 13 pl. i figs. 6-9, pl. ii fig. 11 pars, *S. cf. speciosus* (Ford 1873) p. 14 pl. i figs. 10-13, pl. ii fig. 11 pars both from Spitzbergen, Winsnes.

Serrodiscus sp. p. 972, Hupé (3).

Shantungia spinifera Walcott p. 110, Endo (2).

Shantungia spinifera Walcott p. 426, Lu.

Shumardia orientalis Mansuy 1916 type of *Eoshumardia* gen. n. p. 134, *S. longifrons* Troedsson 1937 type of *Shumardops* gen. n. p. 135, Hupé (4).

Shumardia sp. from Canada (B.C.) p. 471 pl. vii fig. 9, Kobayashi (1).

Shumardia? sp. p. 30 pl. v fig. 40, Sdzuy.

Shumardidae see *Pseudokoldiniodia* gen. n.

Shumardiidae see *Lunacrania* gen. n., Cranidium [undet. genus and species D] of Ross 1951 may belong to Shumardiidae p. 472, Kobayashi (1).

Shumardiidae referred to *Utioidae* p. 133, see *Eoshumardia* & *Shumardops* gen. n., Hupé (4).

Shumardops gen. n. [Shumardiiidae] p. 135 for type *Shumardia longifrons* Troedsson 1937 Tremadoc Tien-Shan text-fig. 134 bis (6) drawing, Hupé Ann. Paléont. 41 1955.

Skreiaspis spinosus (Jahn) p. 186 ff., Havliček & Šnajdr.

Solenoparia puteata Resser & Endo probably a synonym of *P. planifrons* R. & E.; *S. terfa* sp. n. p. 80 pl. v figs. 10–15, pl. viii fig. 18, *S. luna* sp. n. p. 81 pl. vi figs. 6–10, *S. subsphaerica* [subsphearia on pl. expl.] sp. n. p. 81 pl. v figs. 8–9, *S. sobyosensis* sp. n. p. 82 pl. v figs. 16–17, pl. vi figs. 1–5, *S. tangshihensis* sp. n. p. 82 pl. vi fig. 18, pl. vii fig. 1 Cambrian (Middle) Manchuria, *S. sp.* p. 11, *S. bigranosa* E., *S. hemicycla* R. & E., *S. cfr. triangularis* R. & E. p. 15, *S. liaoyangensis* E. [erroneously called *n. sp.*] p. 21, *S. cfr. l.* p. 39, *S. sphaerica* E. p. 27, *S. intermedia* (Walcott) p. 12, *S. taitzuensis* R. & E., *S. cfr. triangularis* [? recte *cfr. triangularis*] R. & E. p. 22, *S. sp.* p. 40, Endo Bull. cent. nat. Mus. Manchoukuo No. 7 1944.

Solenoparia sp. p. 428, Lu.

Solenopariidae — *Eteraspis* and tentatively *Coleopachys* referred p. 116, Hupé (4).

? *Solenopleura cuyana* Rusec. p. 8, Rusconi (5).

Solenopleura ferganensis sp. n. p. 15 pl. i figs. 12–14, *S. sp.* p. 18 pl. iii fig. 9 U.S.S.R. (Turkestan), *S. weberi* sp. n. (MS) p. 17 [unillustr.] U.S.S.R. (Siberia) Cambrian (Middle), Lermontova Middle Cambrian trilobites and gastropods from Shodz-Mira, 1951.

Solenopleura grönwalli Poulsen (type of *Poulsenia* Resser—quod vide)—considered that *S. borealis*, *S. bullata* & *S. similis* P. are conspecific with *S. grönwalli* p. 5, Rasetti.

Solenopleura parva, *S. munsteri* p. 107 ff., *S. spp.* p. 110, Spjeldnaes.

Solenopleura aff. *prantli* Růžička & Bouška p. 186 ff., Havliček & Šnajdr.

Solenopleura sibirica (Rjonsnitzky) of Lermontova 1940 see *Solenopleurella bella* (R.).

Solenopleura subcincta sp. n. p. 22 pl. v figs. 4, 5, 5a Cambrian (Upper) U.S.S.R. (Kazakhstan), Lermontova Upper Cambrian trilobites and brachiopods from Boshche-Kulya, 1951.

Solenopleurella bella (Rjonsnitzky) for *Ptychoparia bella* R. [mistakenly called *Solenopleura sibirica* (R.) by Lermontova 1940—refigured] p. 133 pl. xix figs. 1, 1a–f, Lermontova (1).

Solenopleurellinae — *Schistomestopus* referred p. 107, Hupé (4).

Solenopleuridae Angelin discussed p. 132, Lermontova (1).

Solenopleuroidea — *Isocolidae* referred p. 128, Hupé (4).

Sonoraspis Stoyanow 1952 discussed and defended p. 469, *S. californica* sp. n. Cambrian (Middle) U.S.A. (California) p. 468 pl. i figs. 1–2; *Glossopleura* sp. Lochman 1952 and tentatively *G. leona* L. referred to *S. p.* 468, Stoyanow & Susuki Bull. geol. Soc. Amer. 66 4 1955.

Sphaerexochus see *Sphaeroxochus*.

Sphaerexochus mirus Beyr. p. 379, *S. mirus* Beyr. nov. var. [undescri.] p. 346, *S. mirus* nov. mut. [undescri.] p. 384, Horný.

Sphaerophthalmella [called *Sphaerophthalmoides* & *Spaerophthalmella* on pl. expl.] gen. n. [Leptoplastinae] p. 463 for type *S. inexpectans* sp. n. Ordovician (Lower) Canada (B.C.) p. 464 pl. vii figs. 10a–b, 11, pl. ix figs. 12a–b (drawings), Kobayashi J. Fac. Sci. Tokyo Univ. [2] 9 1955.

Sphaerophthalmus cf. *alatus* (Boeck) p. 529, Lindström.

Sphaeroxochus [sic] *mirus* Barr. (small forms) p. 1 text-fig. 1, Růžička & Bouška.

Sphaeroxochus [sic] *mirus* Barr. p. 207, *S. mirus* mut. [undescri.] p. 208, Svoboda & Prantl (1).

Sphaeroxochus [sic] *mirus* Barr. mut. nov. [undescri.] p. 524, Svoboda & Prantl (4).

Stapeleyella gen. n. [Trinucleidae] p. 35 for type *S. inconstans* sp. n. Ordovician (Middle) Britain (Shropshire) [including the records of *Trinucleus murchisoni* by Reed 1912, 1914, Whittington 1941 & that of *T. gibbsii* by La Touche 1884] p. 36 pl. iv figs. 7-13, *S. murchisoni* (Salter) lectotype chosen p. 39, Whittard Palaeontogr. Soc. [Monogr.] 109 1955.

Staurocephalus murchisoni Barr. p. 377, *S. aff. murchisoni* Barr. (n. var.?) [undescrib.] p. 362, Horný.

Staurocephalus sp. p. 1, Růžička & Bouška.

Stenocombus Raymond 1937 referred tentatively to Emmrichellidae p. 131, Hupé (4).

Stenopareia avus Holm p. 237, Martna.

Stenopilus elongatus Rasetti text. fig. 99 (4 views), Hupé (4).

Stenopilus p. 147, *S. vertical range* pl. xiv, Cloud & Barnes.

Stenosaukia Raymond 1937 probably belongs to Prosaukiinae p. 175, Hupé (4).

Stephanocare? *bergeroni* Kobayashi p. 93 pl. xiv fig. 9; *S.?* sp. Monke 1903 referred to *Blackwelderia monkei* (Walcott) p. 90, Kobayashi (2).

Stephanocare? *monkei* Walcott type of *Blackwelderioidea* gen. n. p. 146, Hupé (4).

Stephanocare richthofeni Monke, S. sp. p. 428, Lu.

Stephanocare richthofeni Nonke [sic] p. 32, *Stepharocare* [sic] sp. p. 10, Endo (1).

Stephanocare richthofeni Monke p. 110, Endo (2).

Strototropis Raymond 1937 referred to Protopliomeropsinae p. 245, Hupé (4).

Stygina Salter 1853 discussed, *S. latifrons* (Portlock 1843) from Scandinavia p. 13 pl. i figs. 1-8 [fig. 3 cf. l.], pl. ii figs. 1-8 [fig. 6 cf. l.], pl. iii fig. 7, pl. iv fig. 10, *S. minor* sp. n. [nom. nud. 1953] Ordovician (Middle) Norway (Oslo) p. 13 pl. iii figs. 1-6, *S. angustifrons* Warburg 1925 p. 14, *S. plautoni* (Schmidt 1904) for *Ogygia*

dilatata plautoni S. p. 14; *S. (Protostygina)* Prantl & Přibyl 1949 discussed p. 15 and considered ancestral to Illaenidae p. 25, Skjeseth Norsk geol. Tidsskr. 35 1955.

Styginidae see *Craigheadia* gen. n.

Styginidae Vogdes 1893 discussed and taken to include *Stygina*, *Raymondaspis*, *Bronteopsis* and *Leptopilus* p. 10; relations to possibly ancestral Zanthoniids and presumed descendants Scutellidae & Illaenidae p. 24 text-fig. 2, Skjeseth.

Sunia see *Amphoton*.

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II.—SUBJECT INDEX

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Additions to Official Lists. — Phillipiidae Oehlert 1886, Toernquistidae Hupé 1953, Direction 41.

General works. — Organisation and affinities of trilobites, Rusconi (2); Statistical methods applied to trilobites with examples, Shaw (4); Trails and habits of trilobites, Seilacher; Stratigraphical correlation, Moore.

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1917, Whittington (8); Proposed suppression of *Asaphus* Brongniart 1817 [in favour of *Asaphus* B. 1822] and of *A. cornigerus* Schlotheim 1820, Jaanusson (3); Proposed suppression of *Cryptonymus* Eichwald 1825 (*non* 1840), *Cryptonymus* E. 1840 considered invalid, Jaanusson (2); Support for proposal to suppress *Phillipsella* Oehlert in favour of *Phillipsinella* Novák 1886, Stubblefield (1); Proposed validation or protection of *Paradoxides* Brongniart 1822, *Olenus* Dalman 1827 and *Parabolina* Salter 1849; proposed suppression of *Entomolitus* Linnaeus 1759 and *Entomostraces* Wahlenberg 1821, Poulsen (1); Proposed validation of the emendation of *Peltura* Milne Edwards 1840 to *Peltura*, Stubblefield (5); Proposed validation of *Sao* Barrande 1846 and of *Ellipsocephalus* [as emended by Emmrich 1839 from *Elleipsocephalus*] Zenker 1833; *Monadina* B. 1846 a contemporaneous subjective synonym of *Sao* B. 1846 (which is given precedence), *Stauromus* Corda 1847 a junior objective synonym of *Sao*, Poulsen (2); Proposed validation of *Trinucleus* Murchison 1839 (by suppression of *Trinucleus* Link 1807) and *Tretaspis* McCoy 1849 (by suppression of *Tretaspis* Murchison 1839); *Edgellia* Shaw 1950 an objective synonym of *Trinucleus* Murchison 1839, Stubblefield & Whittington; *Megalaspis* Angelin 1851 *non* Bleeker 1851 renamed *Megistaspis*, Jaanusson (5); *Wutingia* Endo 1935 *non* Melichar 1926 renamed *Endoaspis*; Camaraspididae a synonym of Pteronephaliidae, *Parabriscoia* Kobayashi 1935 of *Elkia* Walcott 1925, Lochman (1); *Bronteus radiatus* Weber 1932 (*non* Münster) stated to have been renamed by W. B. sidereus, Chernysheva (1); *Aeonia* Burmeister 1843 an objective and *Gerastos* Goldfuss 1843 a subjective synonym of *Proetus* Steininger 1831, R. & E. Richter (2); *Edgellia* Shaw 1950 an objective synonym of *Trinucleus* Murchison 1839, Whittard; *Blountina* Lochman 1944 and *Protillaenus* Raymond 1937 subjective synonyms of *Maryvillia* Walcott 1916; many of Resser's 1942 spp. of *M.* considered synonyms, Rasetti (1); *Clappaspis* Deiss a subjective synonym of *Lyriaspis* White-

house, Öpik (3); *Crotalurus* Volborth 1858 a synonym of *Celmus* Angelin 1854, Jaanusson (4); *Dicranactis* Corda 1847 a synonym of *Scutellum* Pusch 1833, *Holomeris* C. 1847 of *S. (Paralejurus)* C. 1847, R. & E. Richter (1); *Drummuckaspis* Prantl & Přibyl 1949 a synonym of *Proceratocephala* P. & P. 1949, Whittington (3); *Euplethagnostus* Lermontova 1940, *Plethagnostus* Clark 1923, *Pseudorhaptagnostus* L. 1940 [sic] & *Rhaptagnostus* Whitehouse 1936 all synonyms of *Pseudagnostus* Jaekel 1909, *Lopnorites* Troedsson 1937 of *Proceratopyge* Wallerius 1895, Ivshin; *Hamptonella* Resser 1937 a synonym of *Kochiella* Poulsen [1927], Lochman (2); *Mesodema* Whitehouse 1939, *Neoredlichia* Saito 1936, *Redlichops* R. & E. Richter 1941, *Archaeops*, *Kuanyangia*, *Latiiredlichia*, *Pararedlichia*, *Pareops* and *Saukiandops* Hupé 1953 all considered synonyms of *Redlichia* Cossmann 1902, Schindewolf (2); *Modocia* [Walcott 1924] probably a synonym of *Armonia* W. 1924, C. LOCHMAN in Wilson; *Pteronephalina* Resser 1938 a synonym of *Litocephalus* R. 1937, Palmer (2); *Sennocephalus* Resser 1942 a synonym of *Modocia* Walcott 1924, Shaw (3); *Stoermeraspis* Prantl & Přibyl 1947 a synonym of *Octobronteus* Weber 1945, R. & E. Richter (3).

Designation of type species. — *Asaphus* Brongniart 1822—proposed designation of *Entomostracites expansus* Wahlenberg 1821, Jaanusson (3); *Dicranactis* Corda 1847—designation of *Bronteus gigas* C. 1847, *Holomeris* C. 1847—designation of *B. aulicus* C. 1847, R. & E. Richter (1); *Encrinurus* Emmrich 1844—proposed designation of *Entomostracites punctatus* Wahlenberg 1821 (*non* Brünnich 1781); *Odontochile* Hawle & Corda 1847—proposed designation of *Asaphus hausmanni* Brongniart 1822, Tripp & Whittard; *Olenus* Dalman 1827—proposed designation of *Entomostracites gibbosus* Wahlenberg 1821, Poulsen (1); *Paramegalaspis* Thoral 1935—designation of *Megalaspis* (*P.*) *immarginata* T. 1935, Jaanusson (5); *Protopeltura* Brögger 1882—proposed designation of *Peltura praecursor* Westergaard 1909, Henningsmoen (2); *Ptychopyge*

Angelin 1854—proposed designation of *Asaphus angustifrons* Dalman 1827, Jaanusson (1).

Selection of lectotypes.—*Actinopeltis completa* (Barrande 1872), *Cekovia transfuga* (B. 1852), *Dalmanitina proaeva socialis* (B. 1846), *Eccoptochile* (E.) *clavigera* (Beyrich 1845), *E. (Eccoptochiloidea) tumescens* (Barr. 1852), *Klouceckia phillipsi* (B. 1846), *Pharostoma pulchrum* (B. 1846), *Placoparia grandis* Hawle & Corda 1847, *Pseudobasilius ingens* (B. 1852), *Stenopareia panderi* (B. 1852), *Zbirovia arata* (B. 1872), *Zeliszkella hawlei* (B. 1846), *Snajdr*; *Ampyx obtusus* Moberg & Segerberg 1906, *Euloma laeve* Angelin 1854, *Megalaspides dalecarlicus* (Holm 1882), *M. (Lannacus) nericiensis* Wiman 1905, *Niobe emarginula* A. 1851, *Niobella obsoleta* (Linnarsson 1869), *Promegalaspides* (*Borogothus*) *intactus* (M. & S. 1906), *Varvia breviceps* (A. 1854), *Tjernvik*; *Asaphus expansus* (Wahlenberg 1821), Jaanusson (3); *Bristolia bristolensis* (Resser), *Fremontella halli* (Walcott), *Fremontia canadensis* & *F. fremonti* (W.), *Olenellus argentus* W., Harrington; *Bronteus canaliculatus*, *B. intermedius* Goldfuss 1843 spp., *Scutellum* (*S.*) *alutaceum* (G. 1843), *S.* (*Scabriscutellum*) *alternans* (Roemer 1855), *S.* (*Scab.*) *insignitus* (Beyrich 1846), *S.* (*Scab.*) *minus* (R. 1850), *S.* (*Scab.*) *scabrum* (G. 1843), R. & E. Richter (1); *Celmus granulatus* Angelin 1854, Jaanusson (4); *Dudleyaspis quinquespinsosa* (Lake 1896), *Proceratocephala terribilis* (Reed 1914), Whittington (3); *Encrinurus punctatus* (Wahlenberg 1821), Tripp & Whittard; *Gerastos granulosus* Goldfuss 1843, R. & E. Richter (2); *Isocolus sjögreni* Angelin, *Cyphoniscus socialis* Salter, Whittington (5); *Isoteloides whitfieldi* Raymond 1910, Hintze & Jaanusson; *Megistaspis* (*Megistaspidella*) *extenuata* (Wahlenberg 1821), Jaanusson (5); *Olenaspella evansi* (Kobayashi), Wilson; *Paradoxides paradoxissimus* (Wahlenberg 1821), Poulsen (1); *Trinucleus fimbriatus* Murchison 1839, Stubblefield & Whittington; *Wutingia rectangularis* Endo 1935, Kobayashi (1).

Selection of neotype.—*Proetus* (*P.*) *cuvieri* Steininger 1831, R. & E. Richter (2).

STRUCTURE

Terminology.—*Rachis* preferred to *axis*, and *dorsal furrows* to *axial furrows*; glabellar furrows and lobes lettered S & L and numbered from back to front; introduction of terms *eu-ptychopariid* and *steno-ptychopariid* for respectively broad (tr.) and narrow rostral plates, Jaanusson (4); *Metagenal spines* proposed to replace *intergenal spines*, Harrington; *False pre-glabellar furrows* in Encrinurinae, Temple (1); Introduction for Odontopleuridae of terms *antennular notch*, *major pygidial spine*, *pleural ridge* (of pygidium); notation for cephalic spines, Whittington (1).

Segmentation.—Concluded that joint between cephalon and protopygidium of young Odontopleuridae is a primary (not an oblique secondary) segmental division, Whittington (1).

Glabella.—Development of frontal lobe analysed in Cheiruracea and Phacopacea, incorporation of part of anterior border in Encrinurinae, Temple (1); In adult *Protolloydolithus* there is a *prefrontal lobe* separated from rest of glabella by a shallow furrow, Whittard.

Facial sutures.—Considered opisthoparian in *Celmus*, Jaanusson (4); In protaspis of *Diacanthaspis* suture is proparian, but rapidly becomes opisthoparian during early meraspid stages (by sudden loss of the fixigenal spines), Whittington (1); Supposed anterior branch of suture described by Lamont 1948 in *Trinucleus fimbriatus* may be a crack, Whittard.

Eyes.—Progressive decrease in distance between anterior ends of eyes in Swedish Lower Ordovician *Cyclopyge*, Tjernvik; Considered not to be functional in Isocolidae, Whittington (5).

Anterior pits.—Position analysed in Cheiruracea and Phacopacea, Temple (1).

Cephalic spines.—Fixigenal spine of Odontopleurid protaspis referred to occipital segment and considered homologous with posterior pleural

spine of thoracic segments; fixigenal spine disappears very rapidly during development, Whittington (1); Sub-anterior position of genal spines in some Olenellidae discussed and considered a specialised polyphyletic condition, Harrington.

Hypostome. — Circular hole through doublure of hypostome in several Odontopleurids; orientation and attachment of hypostome in this family discussed, Whittington (1); Separation of *Cornuproetus* from *Proetus* is supported by difference in the hypostomes, R. & E. Richter (2).

Thoracic segments. — In *Proetus*, *Cornuproetus* and *Dechenella* the axial ring ("Annulus") of each thoracic segment (and of the first pygidial segment) is divided by a transverse furrow ("Intraannular Furche") into an anterior "Präannulus" and a posterior "Postannulus", but there is no trace of this subdivision on the ventral surface of axial ring, R. & E. Richter (2); Disposition of posterior pleural spines of the foremost thoracic segments of Odontopleuridae is determined by the position of the librigenal spines (and is therefore of little taxonomic value), Whittington (1).

Pygidium. — Barrande's interpretation of the pygidial ribs of Scutellidae as complete pleurae (not half pleurae) upheld, R. & E. Richter (1); Further support for Barrande's interpretation drawn from a pygidium of *Scutellum* (*Thysanopeltis speciosum*), R. & E. Richter (3).

Pygidial spines. — Paired marginal spines considered homeomorphic features, Lochman (1); Within *Scutellum* (*Thysanopeltis*) a morphological series is recognised from forms with very many fringing spines (*meridionalis*) to those with only a single spine for each pygidial rib (*clementinum*), R. & E. Richter (3).

Integument. — The hard integument is an integral part of the organisation of the trilobites, Schindewolf (1).

Composition of integument. — Determination of the amounts of various alkali elements (Li, Na, Rb,

Cs) in several trilobites, showing significant enrichment in Cs compared with enclosing matrix, McKerrow et al. (2).

Ornamentation. — Prevalence of reticulation in Lower Cambrian assemblages, Lochman (2).

Spines. — In some Odontopleurids tips of spines may bear several minute openings, Whittington (1).

Tubercles. — In some Odontopleurids the median tubercle on the occipital ring bears four pits forming a square and rarely a fifth central pit, Whittington (1).

Appendages. — Recorded in *Viñakainella*, Rusconi (2); Suggested that antennules passed forward through antenniferous notches on the anterior cephalic border of Odontopleurids, Whittington (1).

Musculature. — Thoracic musculature discussed, R. & E. Richter (2).

PHYSIOLOGY AND SEX

Enrolment. — Suggested function of articulating furrows (on thoracic axial rings) as buttresses during dorsal flexing of thorax; in *Proetus* the intra-annular furrows may act as further buttresses, R. & E. Richter (2).

Sexual dimorphism. — Possible example in *Redlichia noetlingi* (forms with long or short librigenal spines), Schindewolf (2); Significant differences in cephalic measurements between vars. *typica* and *brevis* of *Geragnostus bisectus* interpreted as sex differences, Shaw (4).

DEVELOPMENT

Ontogeny. — Development described in several Odontopleurids; metaprotaspis of *Diacanthaspis* has long fixigenal spines, proparian facial sutures, separate rostral plate, eyes far forward on cheeks, occipital spine, three (only) pairs of spines on glabella and one pair on anterior border of cephalon, Whittington (1); Redescription as a Phacopid of the protaspis attributed by Beecher to *Acidaspis*, showing the existence of

small conjoined free cheeks; doubt cast on Temple's interpretation of the anterior glabellar furrows of *Dalmanitina*, Whittington (2); Reaffirmation of this interpretation, Temple (2); Lichid protaspis (that ascribed to *Arges consanguineus* by Beecher) redescribed and interpreted as showing faceted eyes, opisthoparian facial sutures, rostral plate, and cephalic doublure with terraced lines, Whittington (6); Cephalic ontogeny of *Calodiscus lobatus* with changes in glabellar shape; immature individuals of various spp. figured, Lochman (2); Meraspid pygidium of *Scutellum* described, R. & E. Richter (3); Young forms of *Protolloydolithus* described with eye-ridges and ocelli which are lost in adult, Whittard; Growth-series (cephala) of several Protolenids described, Suvorova (1).

Growth. — Discussion of place of origin of new segments during development, the pre-caudal hypothesis (segments originating at the junction of thorax and pygidium and passing both forwards into the thorax and backwards into the pygidium) being preferred to the pre-anal hypothesis (segments originating in front of the anal region and passing forwards through a transitory pygidium to be liberated into the thorax), R. & E. Richter (3).

Ecdysis. — Possible moulting condition in *Dalmanitina*, Whittington (2).

EVOLUTION AND CLASSIFICATION

General works (theories). — Odontopleurid ontogenies held to illustrate von Baer's laws, but not to support recapitulation or paedogenesis, Whittington (1).

Phylogeny. — Discussion of several U. Cambrian and L. Ordovician families which are considered monophyletic assemblages derived in most cases from generalised ptychopariid ancestors, Lochman (1); Asaphiscidae and Crepicephalidae considered related and both descended from Ptychopariids, Rasetti (1); Suggested neotenous origin of Cheiruracea and Phacopacea from Ptychopariacea, Temple (1); Rela-

tions within Scutelluidae, family being considered closely related to Illaenidae, R. & E. Richter (1); *Isotelus*-group probably arose from *Megistaspis*-group, Jaanusson (5); Damesellidae, Kobayashi (1); Odontopleuridae, Whittington (1).

Evolutionary trends. — Doubt cast on Williams' 1948 interpretation of the inflation of the fringe in *Marrolithus* as a progressive evolutionary trend, Whittard.

Postulated lineages. — Re-presentation of Kaufmann's 1933 data on lineages in *Olenus*, Simpson; Suggested lines of descent in *Diacanthaspis*, Whittington (1).

Biometry. — General discussion; relative growth of two characters *y* and *x* in trilobites is usually rectilinear (not allometric) and of the form $y = a + bx$ where $a \neq 0$, hence ratios y/x are inconstant and should not be used; use of regression line advocated to obtain *a* and *b*, Shaw (4); Linear relations between various cranial measurements in *Modocia*, measurements used to separate type sp. from two others which are synonymized, Shaw (3); Triangular graphs used for comparing cranidial proportions of Odontopleurids, Whittington (1).

Classification (principles of). — Principles of odontopleurid classification discussed: form of hypostome, glabellar lobes, position of eyes, etc. considered most important; cephalic and thoracic spines of less importance, Whittington (1); Forked hypostomes are developed independently in several unrelated Asaphids and cannot be used for classifying the group, Jaanusson (5); Differences in ventral cephalic sutures (levisellid as compared with steno-ptychopariid) *inter alia* held to justify separation of Mesotaphraspidinae from Dimeropyginae, Jaanusson (4); New genus *Varvia* referred tentatively to Asaphidae on basis of median suture on cephalic doublure although genus otherwise resembles *Sympysurus*, Tjernvik; Presence of fringing pygidial spines not by itself sufficient to define *Scutellum* (*Thysanopeltis*) as such spines are possible in other subgenera of *S.*; number of pygidial

pleural ribs as a generic criterion in Scutelluidae, R. & E. Richter (1); Usage of Bancroft followed in recognising new genera (rather than subgenera) among Shropshire Trinucleids, Whittard.

Classification. — Odontopleuridae classified into Odontopleurinae, Apianurinae, Miraspinae, Selenopeltinae, Whittington (1).

ECOLOGY AND HABITS

Ecology. — Atlantic province fauna of Lower Cambrian interpreted as a deep-water off-shore assemblage, that of Pacific province as shallow-water coastal assemblage; suggested that *Elliptocephala asaphoides* fauna with elements from both provinces inhabited a deep basin on the coastal shelf, Lochman (2).

Habits. — Of Odontopleurids discussed, Whittington (1); Suggested adaptation of Odontopleurids to a resting position on sea floor, Whittington (3); Description and analysis of various trace-fossils ascribed to the actions of trilobites: crawling and grazing (forwards, obliquely, or sideways) as in *Diplichnites*, *Protichnites* and *Dimorphichnus*, burrowing on mud (in shallow pits or deeper burrows, or ploughing forwards) as in *Rusophycus*, *Cruziana* and *Crossochorda*; trails in L. Cambrian of Salt Range are referred to *Redlichia* (mud dweller) and *Ptychopariidae* (loose-sand dwellers), Seilacher; Bile-bite markings as trilobite trails, Lessertisseur (1); *Cruziana* as moulds of trilobite burrows, Lessertisseur (2).

Migration. — Discussion of Cambrian faunal provinces, Öpik (4), Kobayashi (3); In the Cambrian faunas of Queensland there are endemic, Oriental, Pacific, and Atlantic elements, Öpik (2); Lower Cambrian *Elliptocephala asaphoides* fauna of New York contains a mixed assemblage of Atlantic and Pacific province forms, and permits correlation between deposits of the two provinces, Lochman (2); Sequence of trilobite faunas in Dresbachian and Franconian of N. America is affected by three major biofacies-changes (at the beginnings of *Aphelaspis*; *Conas-*

pis and *Ptychaspis* zones); revised correlation of N. American and N.W. European Cambrian successions equates the Dresbachian with the *S. brachymetopa* and *L. laevigata* zones, and the Franconian and Trempeleauan with the *Olenus* series 1–6, Lochman (1); Atlantic province elements in Upper Cambrian faunas of Nevada, Palmer (3); European-type Upper Ordovician fauna in Morocco, Choubert et al.

Teratology. — Abnormal pygidia in *Caliperurus insolitus* (forming 15% of known specimens), damaged cheek in *Diacanthaspis scitulus*, loss of fixigenal spine on one side (possibly by accidental breakage) in some small cranidia of *Apianurus barbatus*, Whittington (1); Damaged pleural lobes of pygidia in *Niobina* sp. and *Megalaspides nericiensis*, Tjernvik; Damaged pygidium in *Dalmanitina*, Šnajdr.

DISTRIBUTION AND FAUNAS

Cambrian. — Argentina, Rusconi (2); Argentina (Mendoza), Rusconi (3), (4); Australia, Öpik (4); Australia (Northern Territory), Casey & Gilbert-Tomlinson; Australia (Northern Territory, Tasmania, W. Australia), Öpik (3); Australia (Northwest), Traves (1), (2); Australia (South Australia), Daily; Australia (Victoria), Thomas & Singleton; Britain, Stubblefield (9); Canada (Eastern), Hutchinson; Canada (Western), Rasetti (2); Canada (Western), Alaska, Okulitch; China (An-hwei), P'an; China (Kwei-chow), Lu (2); France (Languedoc), Géze; Greenland (E. & N.W.), Scotland, Spitzbergen, Poulsen (6); Greenland (N.) and Ellesmere I., Troelsen; Indo-china, Fromaget; Saurin; Korea, Kobayashi (3); Manchuria, Endo; New Zealand, Benson; Norway, Henningsmoen (3); Poland, Samsonowicz; Portugal, Teixeira; Sahara and W. Africa, Furon; Tasmania, Banks; U.S.A. (Appalachians), Rodgers (1); U.S.A. (Great Basin), Palmer (3); U.S.A. (Nevada), Nolan et al.; U.S.A. (N.Y.), Fisher (2); U.S.A. (Rocky Mts. etc.), Mexico, Lochman (4); U.S.S.R. (Kuznetsk), Yavorsky.

Cambrian (Lower). — Canada (B.C.), U.S.A. (Alabama, Nevada), Harrington; Estonia, Öpik (1); Pakistan (Salt Range), Schindewolf (2), Seilacher; U.S.A. (Appalachians), Rodgers (2); U.S.A. (California, Nevada), Hewett; U.S.S.R. (Siberia, Turkestan), Suvorova (2); U.S.S.R. (Yakutsk), Suvorova (1).

Cambrian (Lower and Middle). — U.S.A. (Nevada), Hazzard & Mason; U.S.A. (N.Y., Virginia), Spain (Andalusia), Lochman (2); U.S.S.R. (E. Sayan), Repina; U.S.S.R. (E. Sayan), Repina et al.

Cambrian (Middle). — Australia (Northern Territory), Ivanac; Australia (Victoria), Harris & Thomas; Tasmania, Elliston; U.S.A. (California), Stoyanow; U.S.A. (Wyoming) Shaw (1); U.S.S.R. (E. Siberia), Chernysheva (2).

Cambrian (Middle and Upper). — Australia (Queensland), Öpik (2); S.E. Asia, Kobayashi (2); U.S.A. (Arizona), Palmer (1); U.S.A. (California and Nevada), Palmer & Hazzard; U.S.A. (Wyoming), Shaw & DeLand; U.S.A. (Wyoming, Montana), Shaw (3); U.S.S.R. (Kazakhstan), Ivshin.

Cambrian (Upper). — Argentina (Mendoza), Rusconi (1); Canada (B.C.), U.S.A. (Texas, Arizona), Wilson; China (An-hwei), Lu (1); Korea, Manchuria, Kobayashi (1); Sweden, Tjernvik; U.S.A., Rasetti (1); U.S.A. (California), McAllister; U.S.A. (Central States), Lochman (3); U.S.A. (Michigan), Stumm; U.S.A. (Nevada), Palmer (2); U.S.A. (Nevada, Wisconsin), Europe, Asia, Lochman (1); U.S.A. (N.Y.), Fisher (1); U.S.A. (Oklahoma), Frederickson; U.S.A. (Tennessee and Virginia), Bridge; U.S.A. (U. Mississippi Valley), Bell et al.; U.S.A. (Wisconsin, Minnesota), Moore, Nelson; U.S.A. (Wyoming), Shaw (2), DeLand & Shaw.

Ordovician. — China (Nanking), P'an; Estonia, Röömusoks (1); Indochina, Fromaget; Sweden (Dalarna), Eire, U.S.A. (Va), France, Whittington (5); U.S.A. (Nevada), Nolan et al.; U.S.A. (N.Y.), Lochman (2);

U.S.A. (Virginia and W. Virginia), Kay; U.S.S.R. (Kuznetsk), Yavorsky; U.S.S.R. (Siberia), Ivanova et al.; U.S.S.R. (Urals), Ivanov & Myagkova.

Ordovician (Tremadoc). — Britain (England), Curtis, Stubblefield (9); Norway, Henningsmoen (3); U.S.A. (Texas), Wilson; U.S.S.R. (Kazakhstan), Ivshin.

Ordovician (Lower). — Argentina (Mendoza), Rusconi (1), (2); Australia (W. Australia), Öpik (3); Sweden, Jaanusson (4); Sweden and Norway, Tjernvik; U.S.A., Europe, Asia, Lochman (1); U.S.A. (California), McAllister; U.S.A. (Maryland), Sando; U.S.A. (N. Mexico), Flower; U.S.A. (Tennessee), Bridge; U.S.A. (Utah), Hintze & Jaanusson.

Ordovician (Lower and Middle). — Baltic and Scandinavia, Jaanusson (5); Korea, Manchuria, Tasmania, Kobayashi (1).

Ordovician (Middle). — Bohemia, Šnajdr, Whittington (2); Britain (Shropshire and Wales), Whittard; Estonia, Röömusoks (2); U.S.A. (Tennessee), Neuman.

Ordovician (Middle and Upper). — U.S.A. (California), Langenheim et al.; U.S.A. (Virginia), Bohemia, Eire, Estonia, Scandinavia, Whittington (1); U.S.S.R. (Kazakhstan), Yunnan, Korea, Chugaeva.

Ordovician (Upper). — Britain (N. Wales), Harper; Estonia, Jaanusson (6); Estonia and U.S.S.R. (Leningrad), Oraspöld & Röömusoks; Finland [in boulders], Martinsson; Morocco, Choubert et al.; Poland (Lysa Gora), Kielan; U.S.A. (Ohio), Britain (Scotland), Eire, Whittington (3).

Silurian. — China (Hu-peh), Chow; China (Nanking), P'an; Japan, Kamei & Igō; Sweden, Estonia, R. & E. Richter (2); U.S.A. (California), McAllister; U.S.S.R. (Siberia), Ivanova et al.

Silurian (Lower and Middle). — Bohemia, Britain (England, Scotland), Whittington (1); Britain (England), Curtis.

Silurian (Middle).—Bohemia, R. & E. Richter (1); Britain (England), Bohemia, Whittington (3).

Silurian (Upper).—China (Kweichow), Tsin; U.S.A. (N. Jersey and N.Y.), Swartz & Whitmore; U.S.S.R. (Kuznetsk), Chernysheva (1).

Devonian.—China (Sze-chwan), Yoh; France (Armorica), Pillet; Japan (Gifu), Kobayashi & Igō; U.S.S.R., Weber (2); U.S.S.R. (Kuznetsk), Chernysheva (1).

Devonian (Lower).—Germany (RhineLand), Schmidt; U.S.A. (N.Y.), Whittington (2), (6); U.S.A. (N.Y.), Oklahoma, Whittington (3); U.S.A. (Oklahoma), Whittington (1).

Devonian (Lower and Middle).—Germany (Eifel), Bohemia, R. & E. Richter (3).

Devonian (Middle).—Bohemia, Whittington (3); Czechoslovakia (Silesia), Strnad (1), (2); Germany, R. & E. Richter (2); Germany (RhineLand), Bierther; Japan (Iwate), Okubo (1), (2); Lithuania, Krivtsov; U.S.A. (New York), Oliver.

Devonian (? Middle).—Venezuela (S.W.), Pierce.

Devonian (Middle and Upper).—Germany, Richter; Germany (Eifel, Westerwald), R. & E. Richter (1).

Devonian (Upper).—Germany (RhineLand), Schmidt; Germany (Thuringia), Müller; Poland (L. Silesia), Lewowicki.

Carboniferous.—Indochina, Fro-maget; U.S.A. (Arizona), Gilluly et al.; U.S.A. (California, Nevada), Hewett; U.S.S.R. (Kuznetsk), Yavorsky.

Carboniferous (Lower).—U.S.A. (Nevada), Nolan et al.; U.S.S.R., Weber (1); U.S.S.R. (Mugodzhar Mts.), Balashova.

Permian.—China (Hu-peh), Chow; U.S.A. (Arizona), Gilluly et al.

III.—SYSTEMATIC INDEX

N.B.—Since all the species of the group are fossil, the † used elsewhere in the Zoological Record to indicate fossils is here omitted.

Acanthaloma Conrad 1840 considered probably valid but suppression urged (in favour of *Leonaspis* R. & E. Richter 1917), Whittington (8).

Acanthaloma see *Leonaspis*.

Acanthaloma olini (Troedsson) p. 260, Kielan.

Acanthalomina see *Leonaspis*.

Acanthalominae Prantl & Přibyl 1949 a synonym of *Odontopleurinae* Burmeister 1843 p. 196, Whittington (1).

Acanthaspides barbarus gen. et sp. nov. [nom. nud.] p. 8, Ivshin.

Acantholoma Conrad 1841 considered (as an erroneous subsequent spelling of *Acanthaloma* C. 1840) to be invalid; *A. spinosa* C. 1841 a nomen dubium, suppression urged, Whittington (8).

Acantholoma Castelnau 1843 considered (as an erroneous subsequent spelling of *Acanthaloma* Conrad 1840) to be invalid; *A. conradi* Castelnau 1843 a nomen dubium, suppression urged (in favour of *Acidaspis tuberculatus* Hall 1859), Whittington (8).

Acantholoma (Kettneraspis) moravica Strnad [nom. nud.] p. 73 (79), Strnad (1).

Acanthopyge consanguinea (Clarke 1894) for *Arges consanguineus* C. holotype refigured p. 1202 pl. cxxxii figs. 7–20, 23, ? 21–22 (hypostome attributed), Whittington (6).

Acaste downingiae rare alkali elements content table 1, McKerrow et al. (2).

Acerocare ecorne p. 52, Henningsmoen (3).

Acheilus? sp. p. 22, PALMER in Nolan et al.

Acidaspis lermonthovae sp. n. p. 81 pl. vi figs. 16–17 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Acidaspis Murchison 1839 discussed p. 232, *A. brightii* M. text-figs. 13 a–c; *A. tremenda* Barrande ten-

tatively excluded from *Diacanthaspis* p. 210, *A. ulrichi* Bassler of unknown affinities p. 282, Whittington (1).

Acidaspis Murchison 1839 discussed p. 510, *A. brightii* Murchison p. 510 pl. lviii figs. 8, 12 text-figs. 1A-C, *A. cincinnatiensis* Meek 1873 holotype refigured with synonyms *A. anchoralis* Miller 1875, probably *A. o'nealli* M., & *A. rebecca* Bassler 1932 (refigured) p. 512 pl. lviii figs. 9-11, 13-14, pl. lix figs. 1-3, 6, 9-11; *A. discreta* Reed 1935 a synonym of *Proceratocephala terribilis* (R. 1914) [quod vide] p. 515, Whittington (3).

Acidaspis tuberculatus Hall 1859—proposed to be validated and so attributed by suppressing its homonym *A. tuberculatus* Conrad 1840 and probable synonyms *Acantholoma spinosa* C. 1841 and *Acantholoma conradi* Castelnau 1843, Whittington (8).

Acidaspis tuberculatus—the protaspis attributed by Beecher 1893 redescribed as a Phacopid [quod vide], Whittington (2).

Acidaspis sp. rare alkali elements content table 1, McKerrow et al. (2).

Acidaspis sp. p. 70, V. N. WEBER in Yavorsky.

Acmarhachis Resser—*Agnostus australiensis* Chapman referred p. 247, Öpik (4).

Acontheus cf. *acutangulus* Angelin p. 20, Öpik (2).

Acrocephalaspis gen. n. [Familia incerta, compared with *Acrocephalites*] p. 41 for type *A. fidus* sp. n. p. 43 pl. viii figs. 1-11, 11 a-b, pl. iv fig. 18 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Acrocephalites? *glomeratus* Walcott 1916 horizon and locality discussed, referred to *Rawlinsella* gen. n. p. 46, Shaw (1).

Acrocephalites see *Acrocephalaspis* gen. n.

Acrolichas sp. pl. xxvi fig. 5, Ivanov & Myagkova.

Acrolichas sp. pp. 153, 159, Neuman.

Actinopeltis completa (Barrande) lectotype p. 509, Snajdr.

Agerina gen. n. [Bathyuridae] p. 197 for type *A. erratica* sp. n. for *Proetus* sp. aff. *wöhrmanni* of Tjernvik 1952 p. 198 pl. i figs. 24-26 text-fig. 29, *A. praematura* sp. n. for *Orometopus elatifrons* of Moberg and S. 1906 *partim* (pl. 7 figs. 4-5) p. 200 pl. i figs. 22-23 Ordovician (Lower) Sweden, *A. woehrmanni* (Schmidt) for *P. w.* Schmidt 1907, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Agnostida (various) recorded p. 116, Rusconi (3).

Agnostidae recorded p. 6, P'an.

Agnostus (*Geragnostus*) recorded p. 23, Öpik (2).

Agnostus (or *Homagnostus*?) recorded p. 173, Öpik in Banks.

Agnostus australiensis Chapman referred to *Acmarhachis* p. 247, Öpik (4).

Agnostus calvus Lake specimen of Stubblefield 1933 listed p. 147, Curtis.

Agnostus sidenbladhi Linnarsson and *A. törnquisti* Holm referred to *Geragnostus*, *A. lentiformis* Angelin and *A. glabratus* A. to *Trinodus*, Tjernvik.

Agnostus sp. p. 16, 18, PALMER in Nolan et al.

"*Agnostus*" sp. listed p. 1343, Lochman (2).

Agraulos — relations of Scandinavian spp. with *Nasocephalus* discussed p. 1342, Wilson.

Agraulos cf. *diformis* Angelin p. 20, Öpik (2).

Agraulos sp. p. 646, Hazzard & Mason.

cf. *Agraulos* sp. undet. 2 Cobbold 1913 listed p. 1342, Lochman (2).

Aguaraya acutispina Rusc. pl. i fig. 2, Rusconi (2).

Aidarella see *Urbanaspis* gen. n.

Albansia cf. *A. montanensis* (Howell & Duncan) p. 21, Palmer (1).

Aldanaspis Lermontova 1940 discussed and referred to Dokimcephalidae p. 57, *A. punctatus* L. p. 58 pl. vi figs. 1-4, *A. truncatus* L. MS sp. n. p. 61 pl. vi figs. 5-7 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Aldonaia ornata Lerm. p. 271, Repina.

Aldonaia ornata Lerm. p. 85, Suvorova (1).

Alokistocare aff. *A. althea* (Walcott), *A. sp. cf. A. subcoronatum* (Hall & Whitfield) p. 645, Hazzard & Mason.

Alokistocare ? sp. p. 16, PALMER in Nolan et al.

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Amecephalus see *Pedinocephalus* gen. n.

Amecephalus cormoranus Rusc. pl. i fig. 7, Rusconi (2).

Ameura ? or related form pp. 10, 11, J. M. WELLER in Gilluly et al.

Amgaspis recorded p. 135, Repina et al.

Amgaspis sp. p. 270, Repina.

Amphilichas recorded p. 93, Kay.

Amphilichas lineatus (Ang.) p. 373, Jaanusson (6).

Amphilichas sniatkovi Web., *A. batchaticus* W., *A. cucullus* M. & W., *A. wahlenbergi* ? Warb. p. 65, V. N. WEBER in Yavorsky.

Amphotan recorded p. 41, ÖPIK (3).

Amphotan serotinum p. 19, ÖPIK (2).

"*Amphotan*" sp. pp. 155, 156, Thomas & Singleton.

"*Amphotan*" spp. p. 286, O. P. SINGLETON in Benson.

Ampyx bulbifer Weber 1932 type of *Bulbaspis* gen. n. [quod vide] p. 1336, Chugaeva.

Ampyx drummuckensis (Reed) p. 390, Harper.

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Annamitia spinifera Mansuy discussed p. 279 pl. xl figs. 13-15, Kobayashi (2).

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Anomocare lermontovae Ivsh. [not seen] p. 7, Ivshin.

Anomocare siberica and *A. extornata* Holm & Westergård referred to *Anomocarina* pp. 78, 80; *A. sp.* listed p. 87, Chernysheva (2).

Anomocarella sp. p. 271, Repina.

Anomocarella ? p. 171, ÖPIK in Elliston.

Anomocarella ? recorded p. 174, ÖPIK in Banks.

Anomocarina splendens Lermontova p. 75 pl. viii figs. 4-8, *A. siberica* (Holm & Westergård) for *Anomocare* s. H. & W. p. 78 pl. viii figs. 1-3, *A. extornata* (H. & W.) for *Anomocare* e. H. & W. p. 80 pl. viii fig. 9, *A. excavata* (Ang.) p. 89, Chernysheva (2).

Anomocariooides limbataeformis Lermontova p. 69 pl. vii figs. 1-4, *A. speciosus* sp. n. p. 72 pl. vii figs. 8-10 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Anomocariooides polynensis Ivsh. [not seen] p. 7, Ivshin.

Anopolenus Salter 1864 discussed p. 25, *A. henrici* S. p. 26 pl. iv figs. 3-8, *A. sp.* p. 86, Chernysheva (2).

Antagmus adamsi (Billings) listed p. 1355, *Lochman* (2).

Antagmus sp. p. 8, *PALMER* in *Nolan et al.*

Antatasiidae — suggested reference of *Inouyina* Poletayeva p. 449, *Lochman* (1).

Aoja recorded p. 19, *Öpik* (2).

Apachia convexa sp. n. p. 546 pl. lxv figs. 4-6 Cambrian (Upper) U.S.A. (Wyoming), *DELAND* in *DeLand & Shaw* J. Paleont. 30 3 1956.

Apachia p. 42, *Shaw & DeLand*.

Apatocephalooides ? sp. p. 22, *PALMER* in *Nolan et al.*

Apatocephalus serratus (Boeck) discussed p. 204 pl. ii figs. 7-8 text-fig. 32A, record of Størmer 1922 probably a new sp. p. 205, *A. dubius* (Linnarsson) type apparently lost, *A. sp.* p. 206, *A. pecten* Wiman p. 278; *A. s.* var. *d.* of Schmidt 1907 may belong to *Menoparia* ? *nericiensis* sp. n. p. 206, Tjernvik.

Apatocephalus ? sp. p. 22, *PALMER* in *Nolan et al.*

Aphelaspis Resser 1935 discussed p. 31, *A. nobilis* sp. n. p. 33 pl. iii figs. 1-13, 27 [*A. sp.* on pl. expl.], pl. iv figs. 16-17, *A. boschbekulensis* sp. n. p. 36 pl. iv figs. 1-11, *A. formosus* sp. n. p. 39 pl. iv figs. 12-13, *A. sp.* pl. iii figs. 24, 26, pl. iv figs. 19-25 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Aphelaspis Resser 1933 [sic] referred to Pterocephaliidae p. 458, *Lochman* (1).

Aphelaspis see *Kujandaspis* gen. n.

Aphelaspis see *Kujandina* gen. n.

Aphelaspis see N. gen.

Aphelaspis ? recorded p. 174, *Öpik* in *Banks*.

Aphelaspis camiro (Walcott), *A. hamblenensis*, *A. laxa*, *A. quadrata*, *A. simulans*, *A. tumifrons*, *A. walcotti* Resser spp. p. 20, *LOCHMAN* in *Bridge*.

Aphelaspis walcotti Resser p. 21, *Palmer* (1).

Aphelaspis walcotti Resser p. 51 pl. ix figs. 1-6, *Shaw* (2).

Aphelaspis walcotti p. 42, *Shaw & DeLand*.

Aphelaspis sp. p. 10, *A. R. PALMER* in *McAllister*.

Aphelaspis sp. undet. [possibly including *A. cf. A. walcotti* of Wilson 1954 partim (pl. 26 fig. 17)] p. 1347 pl. cxlvii figs. 3, 9, 10, *Wilson*.

Aphelaspis n. sp. [undescr.] p. 158, *SINGLETON* in *Thomas & Singleton*.

Aphelaspis sp. nov. [undescr.] p. 36, *SINGLETON* in *Harris & Thomas*.

Apianurinae subfam. n. [Odontopleuridae] for *Apianurus* and *Caliperurus* genn. n. p. 252, Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Apianurus gen. n. [Odontopleuridae (Apianurinae)] p. 252 for type *A. barbatus* sp. n. p. 254 pl. xvii figs. 1-21, pl. xviii figs. 1-24, pl. xix figs. 1-29, pl. xx figs. 1-17, 19, text-figs. 1 (terminology), 19 A-B, 20 A-C (reconstructions), 21 (graph), 22 A-F (development), *A. glaber* sp. n. p. 268 pl. xxi figs. 1-15, *A. sp.* ind. p. 269 pl. xxi figs. 16-22, 25-26 Ordovician (Middle) U.S.A. (Va), *A. aff. furcata* (Linnarsson) p. 270 pl. xx figs. 18, 20-25, *A. kuckersiana* (Schmidt), *A. k. var. mickwitzii* (S.), *A. asklundii* (Thorslund), *A. clevei* (Warburg) [tentatively including W. 1925 pl. 6 figs. 7, 9] all so referred p. 271, Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Arapahoia butleri (Stoyanow) with synonym *A. reesidei* Resser p. 546 pl. lxiii fig. 1, *A. levis* Miller p. 547 pl. lxiii fig. 12, *A. sp.* indet. p. 547 pl. lxiii fig. 2, *DeLand & Shaw*.

Arapahoia butleri, *A. levis* p. 42, *Shaw & DeLand*.

Arapahoia lasheriana Ruso. pl. vi fig. 13, *A. australis* R. pl. vi fig. 14, Rusconi (2).

Arapahoia ransomei (Stoyanow) p. 21, *Palmer* (1).

Archaeops Hupé 1952 [recte 1953] a synonym of *Redlichia* p. 282, Schindewolf (2).

Arges consanguineus Clarke 1894 referred to *Acanthopyge* p. 1202, protaspis which was referred to *A. consanguineus* by Beecher 1895 considered not certainly attributable p. 1200 [see Lichid protaspis], Whittington (6).

Armonia Walcott 1924—*Modocia* Resser 1935 [recte W. 1924] probably a junior synonym p. 1343, C. LOCHMAN in Wilson.

Armonia cf. *A. lata* (Howell & Duncan) p. 21, Palmer (1).

Armonia sp. undet. p. 1343 pl. cxlvii figs. 1–2, Wilson.

Asaphellus Callaway 1877 referred to *Megistaspis*-group p. 65, Jaanusson (5).

Asaphellus Callaway—*Kayseraspis* Harrington 1938 may be a subgenus, *A. ? orientalis* Endo partim [hypostome pl. 13 fig. 21] probably belongs to *Istotulus spiculum* E. which is referable to *A.* or *K.* p. 18, Kobayashi (1).

Asaphellus ? venta Hintze type of *Aulacoparia* gen. n., *A. ? quadrata* H. type of *A. (Aulacoparia)* subgen. n. to which are tentatively referred *A. ? eudocia* and *A. ? sp.* A. both of Ross 1951, Hintze & Jaanusson.

Asaphellus [sp. undet.] and *Trigono cerca* [sp. undet.] of Wilson 1954 may belong to a sp. of *Kayseraspis* p. 1347, R. J. Ross in Wilson.

Asaphid see *Homalopyge* gen. n.

Asaphid recorded p. 53, Öpik (3).

Asaphid fragments listed p. 1343, Lochman (2).

Asaphid fragments p. 173, Neuman.

Asaphidae — four Eichwald 1825 spp. of *Cryptonymus* [quod vide] referred as nomina dubia p. 60, Jaanusson (2).

Asaphidae see *Aulacoparia* and *Stenorachis* genn. n.

Asaphidae see *Varvia*, *Lapidaria*, *Hunnebergia* genn. n., and Genus and species indet.

Asaphidae see *Yüpingia* gen. n.

Asaphiscidae considered related to Crepicephalidae p. 1269, Rasetti (1).

Asaphiscinae — assignment of *Blountia*, *Blountiella* and *Maryvillia* accepted p. 1269, Rasetti (1).

Asaphiscus aff. *gregarius* p. 19, Fromaget.

Asaphiscus aff. *gregarius*—record of Fromaget & Bonelli 1932 discussed, considered possibly related to *Blainia* p. 278 pl. xl fig. 16, called *Balinia* [error pro *Blainia*]? aff. g. on pl. expl., Kobayashi (2).

Asaphiscus laeviceps (Walcott) p. 18, *A.* sp. pp. 12, 16, PALMER in Nolan et al.

Asaphoidae — possible relations to Ceratopygidae, Housiidae and Dikelokephalinidae discussed p. 457 text-fig. 5, Lochman (1).

Asaphopsis jacobi p. 27, Fromaget.

Asaphus Brongniart in Desmarest 1817 suppression urged in favour of *Asaphus* Brongniart 1822 [quod vide] p. 94, Jaanusson (3).

Asaphus Brongniart 1822 suggested to be validated by the suppression of *Asaphus* B. 1817 and to be placed on Official List of Generic Names with type species *Entomostratus expansus* Wahlenberg 1821 [so attributed and dated] of which lectotype selected and figured [selection of lectotype and neotype by Balaschova 1953 being invalid] pl. i figs. 1–5, *A. cornigerus* (Schlotheim 1820) [designated as type of *A.* by Miller 1889] considered nomen dubium and suppression urged pp. 90–94, Jaanusson (3).

Asaphus angustifrons Dalman 1827—proposed designation as type of *Ptychopyge* Angelin [quod vide] p. 360, Jaanusson (1).

Asaphus ex. gr. expansus Dalman p. 57 pl. xxv figs. 1a, b, 5, b, *A. cf. ludibundus* Törnquist p. 57 pl. xxv figs. 2a, b, 5, b, *A. sp.* listed p. 62 pl. xxvi fig. 6, Ivanov & Myagkova.

Asaphus hausmanni Brongniart 1822—proposed protection by suppression of its probable senior synonym *Trilobus punctatus* Brönnich

1781, and designation as type of *Odontochile* Hawle & Corda 1847, Tripp & Whittard.

Asaphus stacyi Schmidt 1898 type of *Homalopyge* gen. n. p. 73, *A. centaurus* Dalman 1827 a nom. nud. p. 72, *A. heros* D. 1828 [sic] may belong to *Megistaspis* (*Megistaspidella*) subgen. n. p. 72, Jaanusson (5).

Asaphus sp. [resembling *A. broegeri* Schmidt] p. 258, Tjernvik.

Asaphus sp. listed p. 188, Ivanova et al.

Asaphus sp. rare alkali elements content table 1, McKerrow et al. (2).

Asaphus sp. p. 65, V. N. WEBER in Yavorsky.

Aspidagnostus — cephalon stated to belong to *Clavagnostus*, pygidium to *Pseudagnostus* p. 21, Öpik (2).

Aspidagnostus ♀ sp. p. 21, Palmer (1).

Asteropyge (*Asteropyge*) *lobispina* R. & E. Richter [nom. nud.] p. 102 n., Schmidt.

Asteropyge (*A.*) *punctata*, *A.* (*Neometacanthus*) *stellifera* p. 373, R. & E. Richter (2).

Asthenopsis see *Solenopleura*.

Asthenopsis recorded p. 66, Casey & Gilbert-Tomlinson.

Asthenopsis recorded p. 41, Öpik (3).

Astyctoryphe senckenbergiana p. 372, R. & E. Richter (2).

Atops trilineatus Emmons p. 1383 pl. vi fig. 1; *A. trilineatus* of Ford 1875 referred to cf. *Fordaspis nana* (F.) p. 1389, Lochman (2).

Aulacoparia gen. n. [Asaphidae] p. 51 for type *Asaphellus* ♀ *venta* Hintze 1953, *A.* (*Aulacoparia*) *venta* text-fig. 1A, "Xenostegium" *taurus* of Ross 1951 (non Walcott) referred to *A.* (*A.*) p. 53; *A.* (*Aulacoparia*) subgen. n. p. 54 for type *Asaphellus* ♀ *quadrata* H. 1953 text-fig. 1B and including probably *A.*? *eudocia* and *A.*? sp. A. both of Ross 1951 Ordovician (Lower) U.S.A. (Utah), Hintze & Jaanusson Bull. geol. Instn Univ. Upsala 36 1 1956.

Aulacoparia subgen. n. of *Aulacoparia* gen. n. [quod vide].

Aulacopleura (*Paraulacopleura*) *halfari* sp. n. p. 73 (80) pl. i figs. 1-2, pl. ii figs. 3-4 Devonian (Middle) Czechoslovakia (Silesia), Strnad Sborn. Sluko [A] 2 1956.

Bailiaspis dalmani Angelin (formerly called *Conocoryphe bufo* Hicks) from S. Wales p. 18, Stubblefield (9).

Bailiella Matthew 1884 discussed, *B. cobboldi* Resser p. 9 pl. i fig. 6, Chernysheva (2).

Basilicella sp. p. 77, Kay.

Basocephalus nominalis Ivsh., *B. weberi* I. [not seen] p. 7, Ivshin.

Bathynotus n. sp. [undescr.] cf. *holopyga* (Hall) p. 43, Öpik (3).

Bathyuridae see *Agerina* gen. n.

Bathyuriscellus robustus Lerm. p. 96, Suvorova (1).

Bathyuriscidae recorded p. 168, ÖPIK in Elliston.

Bathyuriscidella palauquiana Rusc. pl. i fig. 16, Rusconi (2).

Bathyuriscidella palauquiana Rusc. p. 117, Rusconi (3).

Bathyuriscids recorded p. 173, ÖPIK in Banks.

Bathyuriscus howelli var. *lodensis* Clark type material discussed and illustrated, sp. may be attributable to *Sonoraspis* [quod vide] p. 680 pl. i figs. 1-2 [where called *Glossopleura lodensis*], Stoyanow.

Bathyuriscus sp. p. 12, PALMER in Nolan et al.

Bellaspidella Rasetti 1945 referred to Idahoiidae fam. n. p. 459, Lochman (1).

Bellefontia recorded p. 936, Sando.

Bellefontia tentatively recorded p. 23, Öpik (2).

Bellfontia [sic] sp. p. 11, J. BRIDGE & G. A. COOPER in McAllister.

Beltella depressa (Salter) specimen of Stubblefield 1933 listed p. 148, Curtis.

Bergeroniaspis Lermontova 1951 discussed and referred to Protoleninae p. 107; *B. kutorginorum* L. 1951 p. 108 pl. ix figs. 11–14 text-fig. 37, *B. divergens* (L.) 1940 p. 110 pl. x figs. 1–5 text-fig. 38 (restor.), *B. ornata* L. 1951 p. 114 pl. x figs. 6–13 text-figs. 39–40, *B. subornata* sp. n. p. 118 pl. xi figs. 1–11 text-figs. 41 (restor.)–42 (5 growth-stages), *B. procera* sp. n. p. 123 pl. xii figs. 8–11 text-fig. 43, *B. nitens* sp. n. p. 125 pl. xii figs. 12–13 text-fig. 44 Cambrian (Lower) U.S.S.R. (Yakutsk), Suvorova Trav. Inst. paléont. Acad. Sci. U.R.S.S. **63** 1956.

Bergeroniaspis divergen [sic] Lerm. p. 270, *B. sp.* p. 271, Repina.

Bergeroniellus Lermontova 1940 discussed and referred to Protoleninae p. 55, *B. micmacciformis* sp. n. p. 57 pl. iii figs. 7–11, pl. iv figs. 1–4 text-figs. 19–20, *B. gurarii* sp. n. p. 63 pl. iv figs. 5–9, pl. 2 fig. 4 *pars* a text-fig. 21 (restoration), *B. spinosus* L. 1951 including *B. asiaticus* of L. 1940 *partim* (pl. 38 fig. 1) and of L. 1951 *partim* (pl. 10 figs. 1, 1a–d) p. 67 pl. iv fig. 10, pl. v figs. 1–9, pl. 1 fig. 1, pl. 2 figs. 2–3, text-figs. 22 (restor.)–23 (6 growth-stages), *B. flerovae* L. 1951 p. 74 pl. vi fig. 1 text-fig. 24 (restor.), *B. asiaticus* L. 1940 excluding several figs. of L. 1940 and 1951 and including synonym *B. brevicalculus* [sic] L. 1951 and *B. atlassovi* L. 1951 *partim* (pl. 11 fig. 4a) p. 77 pl. vi figs. 2–10, pl. 1 figs. 6–7, pl. 2 fig. 1, pl. 3 fig. 1 text-figs. 25 (restor.), 26, 27 (5 growth-stages), *B. atlassovi* L. 1951 restr. (pl. 11 fig. 4) p. 85 text-fig. 28, *B. lermontovae* sp. n. p. 87 pl. vii figs. 1–7, pl. viii figs. 1–7, pl. 1 figs. 2–5 text-figs. 29 (restor.)–31 (9 growth-stages), *B. ketemensis* sp. n. p. 96 pl. vii figs. 8–9 text-fig. 32, *B. expansus* (L.) for *B. asiaticus* var. e. L. 1951 p. 98 pl. ix figs. 1–10, pl. 3 fig. 2 *pars* a text-figs. 33 (restor.)–34 (3 growth-stages), *B. praeexpansus* [*preexpansus* on pl. expl.] sp. n. p. 104 pl. vii figs. 10–11 text-fig. 35, *B. solitarius* sp. n. p. 105 pl. vii figs. 12–13 text-fig. 36 Cambrian (Lower) U.S.S.R. (Yakutsk); *B. ? clavatus* L. referred to *Lermontovia* gen. n. p. 52, Suvorova Trav. Inst. paléont. Acad. Sci. U.R.S.S. **63** 1956.

Bergeroniellus sp. p. 135, Repina et al.

Berkeia affinis (Walcott) p. 19, PALMER in Nolan et al.

Berkeia recorded p. 1559, Fisher (1).

Bernia Frederickson 1949 referred to Parabolinoididae fam. n. p. 454, Lochman (1).

Bettonia gen. n. [Trinucleidae] p. 66 for type *B. frontalis* sp. n. p. 67 pl. ix fig. 7, *B. paucipuncta* sp. n. p. 68 pl. ix figs. 9–11, *B. irregularis* sp. n. p. 69 pl. ix fig. 12, *B. superstes* sp. n. p. 70 pl. ix fig. 15 Ordovician (Middle) Britain (Shropshire), *B. gibbosa* (Elles 1940) for *Trinucleus* (*Cryptolithus*) g. E. restr. holotype refigured p. 67 pl. ix fig. 8, *B. chamberlaini* (E.) for *T. c.* E. holotype and paratype refigured p. 69 pl. ix figs. 13–14, Whittard Palaeontogr. Soc. [Monogr.] **110** 1956.

Bienvillia corax (Billings) p. 22, PALMER in Nolan et al.

Binodaspis spinosa Lerm. p. 96, *B. sp. cf. s.* p. 114, *B. sp.* I Lerm. p. 85, *B. sp.* p. 96, Suvorova (1).

Binodaspis cf. *spinosa* Lerm. p. 270, Repina.

Blackwelderia recorded p. 85, Traves (2).

Blackwelderia? p. 22, Öpik (2).

Blackwelderia alastor p. 32, Fromaget.

Blackwelderia cf. *biloba* Kobayashi p. 171, ÖPIK in Elliston.

Blackwelderia cf. *biloba* Kobayashi p. 174, ÖPIK in Banks.

Blackwelderia sp. p. 52, Traves (1).

Blainia—*Asaphiscus* aff. *gregarius* record of Fromaget & Bonelli 1932 may be related p. 278, Kobayashi (2).

Blandicephalus Palmer 1954 [recte 1955] referred to Pterocephaliidae p. 458, Lochman (1).

Blountia assignment to Asaphiscinae supported; *B. angustata*, *B. arguta*, *B. widnerensis* Resser 1942 spp. synonyms of *Maryvillia arion* Walcott p. 1267; *Maryvillia bristolensis* and probably *M. violaensis* R. considered typical of *B.* p. 1268, Rasetti (1).

Blountia alexas, *B. anser*, *B. mimula* (Walcott spp.), *B. rogersvillensis* Resser [with synonym *Blountiella lata* R.], *B. assimilis* R., *B. crassa* R., *B. arcuosa* R. p. 20, LOCHMAN in Bridge.

Blountia cf. *B. assimilis* Resser p. 1343, Wilson.

? *Blountia baranqueana* Rusc. pl. i fig. 5, *B. cuyana* R. pl. vii fig. 3, *B. pampeana* R. pl. vii fig. 4, Rusconi (2).

Blountia carlotta Lochman p. 548 pl. lxiii figs. 3-8, DeLand & Shaw.

Blountia carlotta & *B. c.*? p. 42, Shaw & DeLand.

Blountia socorrensis sp. n. p. 117 text-fig. 3, *B. luanensis* sp. n. p. 118 text-fig. 4 Cambrian Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 3-4 1956.

Blountia sp. p. 21, Palmer (1).

Blountia n. sp. [undescr.] p. 158, SINGLETON in Thomas & Singleton.

Blountiella buttsi Resser listed; *B. lata* R. a synonym of *Blountia rogersvillensis* R. p. 20, LOCHMAN in Bridge.

Blountina Lochman 1944 a synonym of *Maryvillia* Walcott 1916 to which its type *B. eleanora* L. 1944 is referred, *B. triangularis* L. 1944 and *B. westoni* Rasetti 1946 synonyms of *M. arion* W. 1916 p. 1267, Rasetti (1).

Boeckaspis hirsuta p. 52, Henningsmoen (3).

Bolaspidella see *Bolaspis*.

Bolaspidella & *B.?* p. 42, Shaw & DeLand.

Bolaspidella macgerriglei (Raymond) p. 1343 pl. xlvi fig. 8, Wilson.

Bolaspidella sp. p. 21, Palmer (1).

Bolaspidella spp. pp. 16, 18, PALMER in Nolan et al.

Bolaspis ? *resseri* p. 41, Shaw & DeLand.

Bolaspis (or *Bolaspidella*) n. sp. [undescr.] p. 46, Shaw (1).

Bonnaria gen. n. [Dorypygidae] p. 1383 for type *Bonnia salemensis* Resser p. 1386 pl. vii figs. 11-12 Cambrian (Lower) U.S.A. (N.Y.), following spp. also assigned to *B.*—*Ptychoparia*? *clavata* Walcott [identity doubtful], *Bonniella virginica* Resser, *B.?* *hispanica* R. & E. Richter, Lochman Bull. geol. Soc. Amer. 67 10 1956.

Bonnia cf. *B. laevigata* (Rasetti) p. 8, PALMER in Nolan et al.

Bonnia salemensis Resser type of *Bonnaria* gen. n. [quod vide] p. 1386; *Bonnia* sp. undet. p. 1386 pl. v fig. 11, Lochman (2).

Bonnia sp. p. 270, Repina.

Bonnia sp. p. 135, Repina et al.

Bonniella virginica Resser and *B.?* *hispanica* R. & E. Richter referred to *Bonnaria* gen. n. p. 1386, Lochman (2).

Bonniopsis sp. sp. p. 77, Troelsen.

Borogothus subgen. n. of *Promegalaaspides* [quod vide].

Bowmania americana (Walcott) p. 22, PALMER in Nolan et al.

Brachyaspidion rhynchina (Miller) p. 144, Shaw (3).

"*Brachyaspis*" *robusta* (Roem.) p. 378, Jaanusson (6).

Brachymetopina see *Brachymetopus*.

Brachymetopus maccoyi (Portlock) p. 164 pl. xlvi figs. 3-4, *B. uralicus* (Verneuil) pl. xlvi figs. 1-2, Weber (1).

Brachymetopus (*Brachymetopus*) *peneaui* R. & E. Richter p. 37 text-figs. 8, 8a, *B.* (*Brachymetopina?*) *saminni* Oehlert 1886 a nom. nud. p. 38, Pillat.

Brassicicephalus spp. p. 21, Palmer (1).

Brevidiscus? *agnostoides* Kobayashi a synonym of *Calodiscus lobatus* (Hall) [quod vide] p. 1378, Lochman (2).

Briscoia Walcott 1925 referred to Dikelocephalidae p. 449, *B. pertransversa* sp. n. Cambrian (Upper) U.S.A. (Wisconsin) p. 460 pl. xlvi figs. 1-4, Lochman J. Paleont. 30 3 1956.

Briscoia kraglievichi Ruse. text-fig. 36, Rusconi (2).

Briscoia nevadensis Resser p. 22, PALMER in Nolan et al.

Briscoia sp. A p. 99 pl. i fig. 16 Cambrian (Upper) U.S.A. (Mich.), Stumm.

Bristolia gen. n. [Olenellinae] for type *Mesonacis bristolensis* Resser lectotype chosen p. 59 text-fig. 1D, *M. insolens* R. also referred to gen., *B.* sp. for *Olenellus fremonti* Walcott *partim* [1910 pl. 37 figs. 16 (refigured), 19] p. 57 pl. xv fig. 7, Harrington J. Paleont. 30 1 1956.

Broggerolithus sp. p. 386ff., Harper.

Brongniartella recorded pp. 73, 93, Kay.

Brongniartella bisulcata (Salter) p. 386 ff., *B.* sp. p. 387, Harper.

Brongniartella cf. *platynotus* p. 260, Kielan.

Brongniartella rufa (Salter) p. 394, HUPÉ in Choubert et al.

Bronteidae see *Dulanaspis* gen. n.

Bronteopsis Nicholson & Etheridge 1879 discussed and excluded from Scutellidae p. 99, R. & E. Richter (1).

Bronteopsis? *toernquisti* (Moberg & Segerberg) holotype refigured p. 261 pl. x fig. 17, Tjernvik.

Bronteus angusticaudatus Etheridge & Mitchell 1917 probably belongs to *Kolihapeltis* p. 150, Kobayashi & Igō.

Bronteus costatus Pusch p. 6 pl. i fig. 6, *B. elegans* Peetz [Petts] p. 8 pl. i fig. 1, *B. sibiricus* Tschern. p. 9 pl. i fig. 12, *B. tullius* Hall p. 11 pl. i fig. 10, *B. arcticus* Weber 1945 [not seen] p. 12 pl. i fig. 4 text-fig. 2, *B. eugeni* Tchernysheva [not seen] holotype figured p. 13 pl. i fig. 5 text-fig. 3, *B. tenuistriatus* sp. n. p. 14 pl. i figs. 2 a-6, Devonian (Middle), *B. mirabilis* sp. n. p. 15 pl. i fig. 9 Devonian (Upper), *B. signatus* Goldfuss p. 16 pl. i fig. 8, *B. pustulatiformis* sp. n. p. 17 pl. i fig. 16 Silurian (Upper), *B. aff. pustulatus* Barrande p. 18 text-fig. 4, *B. aff. bischofi* Roemer p. 19 pl. i

fig. 7, *B.* sp. No. 1 p. 20 text-fig. 5, *B.* sp. No. 2 p. 20 Silurian (Upper) U.S.S.R. (Kuznetsk); *B. radiatus* Weber 1932 (*non* Münster) stated to have been renamed by W. *B. sidereus* nom. n. p. 12 n, Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Bronteus gigas Corda selected as type of *Dicranactis* C. 1847 and a synonym of *Scutellum* (*S.*) *paliferum* Beyrich 1845 p. 99, *B. granulatus* Goldfuss 1843 a synonym of *S.* (*S.*) *costatum* Pusch 1833 p. 96, *B. intermedius* G. 1843 (lectotype chosen) of *S.* (*S.*) *flabelliferum* (G. 1839) p. 96, *B. aulicus* C. 1847 selected as type of *Holomeris* C. 1847 and a synonym of *S.* (*Paralejurus*) *brongniarti* (Barande) p. 99, *B. planus* C. 1847 type of *S.* (*Planiscutellum*) subgen. n. p. 102, *B. scaber* G. 1843 (lectotype chosen) type of *S.* (*Scabriscutellum*) subgen. n. with synonym *B. canaliculatus* G. (lectotype chosen) p. 102, *B. halli* Woodward 1910 a synonym of *S.* (*Thysanopeltis*) *acanthopeltis* (B. 1852) p. 94, R. & E. Richter (1).

Bulaiaspis volodgini Lerm., *B. primus* L., *B. taseevicus* Repina MS, *B. limbatus* R. MS p. 269, *B. sajanicus* R. MS p. 270, Repina.

Bulaispis [sic] p. 134, Repina et al.

Bulbaspis gen. n. [Raphiophoridae] p. 1336 for type *Ampyx bulbifer* Weber 1932, *B. ovulum* (W. 1948) text-fig. 1 (I), [where called type of *B.*], *B. sphaerornata* sp. nondescr. text-fig. 1 (II), *B. mirabilis* sp. nondescr. text-fig. 1 (III) Ordovician (Middle and Upper) U.S.S.R. (Kazakhstan), Chugaeva C.R. Acad. Sci. U.R.S.S. NS 11 6 1956.

Bumastid (pygidium) recorded p. 17, J. M. BERDAN in McAllister.

Bumastus nudus Ang., *B. maculum* Salt. p. 65, V. N. WEBER in Yavorsky.

Bumastus? sp. p. 2089, Langenheim et al.

Burnetia alta Resser p. 548 pl. lxv figs. 1-3, DeLand & Shaw.

Burnetia alta p. 42, Shaw & DeLand.

Burnetia sp. pp. 19, 22, PALMER in Nolan et al.

Burnetia-like trilobite recorded p. 47, Öpik (3).

Bynumia p. 42, Shaw & DeLand.

Bynumia n. sp. [undescr.] p. 158, SINGLETON in Thomas & Singleton.

Bynumia sp. p. 36, SINGLETON in Harris & Thomas.

Bynumia sp. indet. p. 549 pl. lxiii figs. 9-11, DeLand & Shaw.

Bynumia? sp. p. 21, Palmer (1).

Calchaquiana gen. n. [no family assigned], *C. curvata* sp. n. p. 7 fig. 6 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Calchaquiana curvata Ruse. pl. xii fig. 6, Rusconi (2).

Caliperurus gen. n. [Apianurinae] p. 271 for type *C. insolitus* sp. n. p. 273 pl. xxii figs. 1-7, pl. xxiii figs. 1-15, pl. xxiv figs. 1-28, text-figs. 23 (graph), 24 (reconstruction) Ordovician (Middle) U.S.A. (Va), Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Callavia sp. p. 47, Henningsmoen (3).

Calliops? recorded pp. 92, 93, Kay.

Calliops sp. listed p. 188, *C. sticta* Kramarenko pl. ii fig. 3, Ivanova et al.

Calliops sp. p. 155, Neuman.

Calodiscus meeki (Ford) p. 1377 pl. vii fig. 25, *C. lobatus* (Hall) with synonym *C. agnostoides* (Kobayashi) [considered an immature form] p. 1378 pl. viii figs. 1-11 text-fig. 2 (changes in glabellar shape), *C. schucherti* (Matthew) and *C. walcotti* Rasetti listed p. 1354, cf. *C. sp.* undet. p. 1341, Lochman (2).

Calvinella recorded p. 71, Casey & Gilbert-Tomlinson.

Calvinella recorded p. 47, Öpik (3).

Calvinella tenuisculpta Walcott p. 22, PALMER in Nolan et al.

Calvinella wisconsinensis, *C. spiniger* p. 179, Nelson.

Calybole see *Cyrtosymbole*.

Calymene recorded pp. 91, 92, Kay.

Calymene blumenbachi rare alkali elements content table 1, McKERROW et al. (2).

Calymene camerata p. 1034, Swartz & Whitmore.

Calymene (Colpocoryphe) grandis sp. n. for *C. grandis* Holub 1911 MS nom. nud. Ordovician (Middle) Bohemia p. 501 (529) pl. iii figs. 1-9, Snajdr Sborn. úst. Úst. geol. 22 [Pal.] 1956.

Calymene maloungaensis Mansuy p. 450 ff., Yoh.

Calymene? *punctata* of Murchison 1839 (pl. 23 fig. 8a) referred to *Encrinurus onniensis* Whittard p. 149, Curtis.

Calymene sp. listed p. 188, Ivanova et al.

Calymene sp. p. 155, Neuman.

Calymenella see *Eohomalonotus*.

Calymenella bayani Trom. et Lebesc., *C. boisseli* Bergeron, *C. media* Barr., *C. cf. m.* p. 394, HUPÉ in Choubert et al.

Calymenid pygidium p. 388, Harper.

Calymenidae considered closely related to *Cheiruracea* and *Phacopacea* p. 428, Temple (1).

Calymene cf. *baylei* p. 21, Fromaget.

Camaraspidae Lochman a synonym of *Pterocephaliidae* Kobayashi p. 458, Lochman (1).

Camaraspis Ulrich & Resser 1934 referred to *Pterocephaliidae* p. 458, Lochman (1).

Camaraspis recorded p. 1559, Fisher (1).

Camaraspis plana Frederickson p. 549 pl. lxvi fig. 13, pl. lxv fig. 1 pars., DeLand & Shaw.

Camaraspis plana p. 41, Shaw & DeLand.

Camaraspoides Frederickson 1949 referred to *Pterocephaliidae* p. 458, Lochman (1).

Canotiana villavicensis Ruse. text-fig. 5, *C. calensis* R. text-fig. 6, *C. lasherensis* R. text-fig. 7, Rusconi (2).

Caphyra recorded p. 6, P'an.

Caphyra radians (Barrande) p. 390, Harper.

Carmona multilobus Barr. p. 258 pl. i fig. 7, pl. iii figs. 5–6, Kielan.

Catillicephalia lata Raymond and *C. fowleri* Shaw statistical comparison pp. 1218–1221, Shaw (4).

Catillicephalidae (sensu Rasetti 1954) may not be homogeneous, *Celmus* cannot be referred p. 41, Jaanusson (4).

Cayastaia flexuosa Rusc. pl. iii fig. 10, Rusconi (2).

Cedaria milleri Resser p. 549 pl. lxiii figs. 13–15, DeLand & Shaw.

Cedaria milleri p. 42, Shaw & DeLand.

Cedaria puelchana Rusc. pl. vi figs. 9–11, Rusconi (2).

Cedariidae recorded p. 22, Öpik (2).

Cedarina see *Ithyektyphus* gen. n.

Cedarina cf. *C. cordillerae* (Howell & Duncan), *C. cf. C. nixonia* Lochman p. 21, Palmer (1).

"*Cedarina*" sp. indet. p. 550 pl. lxiv figs. 14–16, DeLand & Shaw.

Cekovia gen. n. [Illaeninae] p. 493 (529) for type *Illaenus transfuga* Barrande 1852 lectotype chosen p. 493 pl. ii figs. 1–4 text-fig. 2 Ordovician (Middle) Bohemia, *C. distincta* (B.) and *C. salteri* (B.) so referred, Snajdr Sborn. úst. Úst. geol. 22 [Pal.] 1956.

Celmidae fam. n. for *Celmus* Angelin p. 38, Jaanusson Bull. geol. Instn Univ. Upsala 36 1 1956.

Celmus Angelin 1854 discussed and referred to *Celmidae* fam. n., *Crotalurus* Volborth 1858 [quod vide] a synonym, *C. granulatus* A. 1854 lectotype chosen and figured, pygidium and hypostome assigned p. 42 pl. i figs. 1–7 text-figs. 2 A–D, *C. aff. granulatus* pl. i figs. 8–9, *C. barrandei* (Volborth) may be identical with *C. granulatus* p. 46 text-figs. 2E–F, *C. sp.* indet. for *C. g.* of Bohlin 1955 p. 42, Jaanusson (4).

Centropleura aff. *loveni* Angelin, *C. n. sp.* [undescr.] p. 20, Öpik (2).

Centropleura nelgecta Öpik p. 155, identification (as *C.*) doubtful p. 161, Thomas & Singleton.

Centropleura siberica Lermontova p. 20 pl. iv fig. 2, *C. oriens* L. MS sp. n. p. 22 pl. iii figs. 1–9 Cambrian (Middle) U.S.S.R. (Siberia), *C. sp.* pl. i fig. 9 pars, *C. sp.* pl. iv fig. 1, *C. sp.* p. 87, *C. ? sp.* p. 88, Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Ceratagnostus magister Whitehouse a synonym of *Doryagnostus incertus* (Brögger) p. 14, A. H. WESTERGÅRD in Öpik (2).

Ceratarges armatus p. 372, R. & E. Richter (1).

Ceratevenkaspis armata Kramarenko listed p. 188, Ivanova et al.

Ceratocephala Warder 1838 referred to Miraspinae, *C. laciniata* Whittington & Evitt p. 239 pl. xiv figs. 2–6, 8–15, text-figs. 2C, 16, *C. rarispina* sp. n. p. 242 pl. xv figs. 1–25, 28–29; *C.* (*Ceratocephalina*) subgen. n. p. 243 for type *C.* (*Ceratocephalina*) *tridens* sp. n. p. 244 pl. xvi figs. 1–24, *C.* (*C.*) sp. ind. p. 246 pl. xv figs. 26–27, 30 Ordovician (Middle) U.S.A. (Va); *C. asklundii* Thorslund referred to *Apianurus* gen. n. p. 271, Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Ceratocephala cerealepta Anthony 1838 considered unrecognisable p. 512, Whittington (3).

Ceratocephalidae see Miraspinae.

Ceratocephalina subgen. n. of *Ceratocephala* [quod vide].

Ceratonurus Prantl & Přibyl 1949 discussed p. 250, Whittington (1).

Ceratopyge forficula (Sars) listed p. 277, Tjernvik.

Ceratopygidae discussed, relations to Housiidae and Asaphoidae p. 457 text-fig. 5, Lochman (1).

Ceraurid trilobites p. 172, Neuman.

Ceraurus intermedius Kielan p. 258, Kielan.

Ceraurus sp. listed p. 188 pl. iii figs. 3–4, Ivanova et al.

Chakasskia Poletayeva 1936—suggested reference to Protolenidae p. 449, Lochman (1).

Changshania see *Maladiooides*.

Charabaia gen. n. [Proetidae], *C. montenegrensis* sp. n. p. 5 fig. 3 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Charabaia montenegrensis Ruse. pl. xii fig. 3, Rusconi (2).

Chasmops eichwaldi Schmidt p. 373, Jaanusson (6).

Chasmops inge Röömusoks p. 302, *C. maxima* Schm., *C. macrourus* (Sjögren) p. 303, *C. musei* Öpik p. 305, Oraspöld & Röömusoks.

Chasmops marginata Schm., *C. genuina* S., *C. emarginata* S., *C. mutica* S. pp. 22-23, *C. odini* (Eichw.) p. 24, Röömusoks (1).

Chasmops sp. p. 387, Harper.

Chaunoproetus palensis (Rud. Richter) p. 28, cf. *C. ? eurycraspedon* (R. R.) p. 25, Müller.

Cheilocephalidae fam. n. for *Cheilocephalus* p. 49, Shaw J. Paleont. 30 1 1956.

Cheilocephalus Berkey 1898 referred to Cheilocephalidae fam. n. p. 49, *C. delandi* sp. n. Cambrian (Upper) U.S.A. (Wyoming) p. 49 pl. x figs. 1-7, pl. xi figs. 1-6, pl. xii figs. 1, 6, Shaw J. Paleont. 30 1 1956.

Cheilocephalus p. 42, Shaw & DeLand.

Cheilocephalus breviloba (Walcott) p. 20, LOCHMAN in Bridge.

Cheilocephalus sp. p. 19, PALMER in Nolan et al.

Cheiruracea discussed, close relations to Phacopacea postulated, Temple (1).

Cheiruridae — *Celmus* cannot be referred p. 41, Jaanusson (4).

Cheirurus (*Crotaeocephalus*) Salter 1853 discussed with list of species p. 147, *C. (Crotaeocephalus) japonicus* sp. n. for *C. sternbergi* of Kamei & Igō 1955 partim p. 150 pl. x figs. 1-4, *C. (C.)* sp. indt. p. 152 pl. x figs. 5 a-b text-fig. 2 Devonian Japan (Gifu), Kobayashi & Igō Japan. J. Geol. Geogr. 27 2-4 1956.

Cheirurus bimucronatus rare alkali elements content table 1, McKerrow et al. (2).

Cheirurus aff. *getasinosus* [sic] Portl., *C. sp.* pp. 65, 70, V. N. WEBER in Yavorsky.

Cheirurus sternbergi Boek from Japan p. 457 text-fig., Kamei & Igō.

Cheirurus sternbergi Boeck 1833 p. 189 pl. xlvi figs. 1 a-c, 3, *C. quenstedti* Barrande 1852 p. 189 pl. xlvi fig. 2, Weber (2).

Cheirurus (*Crotaeocephalus*) *sternbergi* *myops* p. 373, R. & E. Richter (2).

Cheirurus aff. *welleri* Raymond p. 43 pl. iii fig. 3, *C. (Crotaeocephalus) myops* F. Roemer p. 44 pl. iii figs. 2, 12, text-fig. 9, *C. (C.) yavorskyi* sp. n. Devonian (Lower) p. 46 pl. iii figs. 7 a-b, text-fig. 10, *C. (C.) parvus* sp. n. Devonian (Middle) p. 48 pl. iii figs. 14 a-b U.S.S.R. (Kuznetsk), Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Cheirurus sp. listed p. 188, Ivanova et al.

Chilonorria zulupensis Ruse. pl. iv fig. 2, Rusconi (2).

Chittidilla plana King 1941 may be identical with *Ptychoparia richteri* Redlich 1899 p. 282, Schindewolf (2).

Chomatopyge Whittington & Evitt 1954 referred to Mesotaphraspidinae subfam. n. p. 47, Jaanusson (4).

Chondragraulos minussensis Lerm. p. 270, *C. sp.* p. 271, Repina.

Chosenia Kobayashi 1934 discussed and referred to Kaolishaniinae, *C. laticephala* K. discussed p. 14 pl. ii figs. 3 a-b (drawings), Kobayashi (1).

Chuangia nais p. 32, Fromaget.

Ciceragnostus cicer (Tullb.) p. 87, Chernysheva (2).

Clappaspis [Deiss] a synonym of *Lyriaspis* Whitehouse p. 43, Öpik (3).

Clavagnostus recorded p. 22; cephalon of *Aspidagnostus* referred to *C.* p. 21, Öpik (2).

Clavagnostus recorded p. 184, Öpik in Banks.

Clavagnostus calensis Ruse. text-fig. 3, Rusconi (2).

Clavagnostus repandus (Holm & West.) p. 87, Chernysheva (2).

Clavaspidella howelli? (Walcott) p. 645, Hazzard & Mason.

Clelandia Cossman 1902 may belong to Mesotaphraspidinae subfam. n. p. 47, Jaanusson (4).

Cliffia latagenae [sic] (Wilson) p. 551 pl. lxv figs. 11-12, DeLand & Shaw.

Cliffia latagenae [sic] p. 42, Shaw & DeLand.

Cobboldia dentata Lerm. p. 85, C. sp. p. 63, Suvorova (1).

Colpocoryphe see *Calymene*.

Comanchia Frederickson 1950 referred to Idahoiidae fam. n. p. 459, Lochman (1).

Conaspis considered ancestral to Ptychaspidae, Eurekiidae and Saukidae text-fig. 3, *C. perseus* variation discussed; *Wuhua belus* (Walcott) may be a late sp. of *C.* p. 450, Lochman (1).

Conaspis recorded p. 1559, Fisher (1).

Conocephalites? recorded p. 174, ÖPIK in Banks.

Conocephalites? p. 171, ÖPIK in Elliston.

Conocoryphe bufo Hicks see *Bailiaspis dalmani* Angelin.

Conocephalina discussed, *Lobococephalina* may be a congeneric geographic variant p. 453, Lochman (1).

Conolichas eichwaldi (Nieszk.) p. 305, Oraspöld & Röömusoks.

Coosella recorded p. 22, ÖPIK (2).

Coosella (pygidium resembling) p. 67, Casey & Gilbert-Tomlinson.

Coosella amage (Walcott), *C. andreas* (W.), *C. tennesseensis* Resser p. 20, LOCHMAN in Bridge.

Coosella cf. *C. connata* (Walcott), *C.* sp. p. 21, Palmer (1).

Coosella convexa Rusc. pl. vi figs. 7-8, Rusconi (2).

Coosellidae Palmer discussed and taken to include *Coosella*, *Sympacheilus* and *Coosia*; *Crepicephalus* excluded p. 458, Lochman (1).

Coosellidae Palmer—if *Crepicephalus* is included fam. should be called Crepicephalidae [quod vide] p. 1269, Rasetti (1).

Coosia — suggested that *Crepicephalus*? *perplexus* Palmer may belong p. 458; *Coosia tokunagai* Kobayashi [type of *Mansuyella* Endo]—*Shirakiella laticonvexa* K. a synonym p. 458, Lochman (1).

Coosia recorded p. 174, ÖPIK in Banks.

Coosia recorded p. 22, ÖPIK (2).

Coosia recorded p. 53, ÖPIK (3).

Coosia alfaensis Rusc. pl. ii fig. 10, *C. huentotiana* R. pl. v fig. 4, Rusconi (2).

Coosia connata (Walcott)? p. 551 pl. lxvii fig. 6, *C. dakotensis* Resser p. 551 pl. lxvii fig. 5, DeLand & Shaw.

Coosia dakotensis, *C. connata*? p. 42, Shaw & DeLand.

Coosia robusta (Walcott) listed; *C. athletes* of Resser 1938 referred to *Maryvillia* sp. p. 20, LOCHMAN in Bridge.

Coosia sp. p. 21, Palmer (1).

Coosina gen. n. [Crepicephalidae] p. 1267 for type *Maryvillia ariston* Walcott 1916 restr. [non pl. 64 fig. 5a] with following spp. of *M.* as synonyms—*georgica* [partim], *keithi*, *masadensis* [partim], *widnerensis* Resser 1938 spp., *alberta*, *marjimensis*, *montis*, *moosensis*, *utahensis*, *wyomingensis* R. 1942 spp., *aequa* Duncan 1944, cf. *ariston* of Palmer 1955 p. 1268; *M. loperi* R. 1942 an independent sp. of *C.*, Rasetti J. Paleont. 30 5 1956.

Corbinia sp. p. 22, PALMER in Nolan et al.

Cornuproetus R. & E. Richter 1919 elevation to generic status accepted p. 352, *C. cornutus* (Goldfuss) text-fig. 3 (reconstruction), pl. i fig. 4, pl. ii fig. 9 (section), R. & E. Richter (2).

Cornuproetus see *Proetus*.

Coronocephalus rex Grabau emend. Wang p. 634 pl. iv fig. 14, Tsin.

Coronocephalus rex Gr. recorded p. 11, P'an.

Corynexochus commodus Ivsh., *C. asiatica* I. [not seen], *C.* sp. p. 7, Ivshin.

Corynexochus macrorthalmus Lermontova MS sp. n. p. 67 pl. vi figs. 11–15 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Corynexochus sp. p. 36, SINGLETON in Harris & Thomas.

Corynexochus sp. p. 158, Thomas & Singleton.

Costonia gen. n. [Trinucleidae] p. 50 for type *Marrolithus ultimus* Bancroft 1949 Ordovician (Middle) Britain (Shropshire), *C.* n. sp. Dean MS [undescr.] p. 50, Whittard Palaeontogr. Soc. [Monogr.] 110 1956.

Cotalagnostus altus (Grönw.) p. 86, *C. confusus* (West.) p. 89, Chernysheva (2).

Crassifimbria [sic] sp. p. 8, PALMER in Nolan et al.

Crepicephalidae accepted as including *Crepicephalus*, *Coosia*, *Coosina* gen. n., *Coosella*, *Sympacheilus* p. 1269, considered related to Asaphiscidae, Rasetti (1).

Crepicephalina Endo & Resser 1937 discussed p. 62, *C. parva* sp. n. p. 63 pl. vi figs. 8–9 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Crepicephalina recorded p. 66, Casey & Gilbert-Tomlinson.

Crepicephalina recorded p. 19, Öpik (2).

Crepicephalus excluded from Coosellidae, *C. ? perplexus* Palmer may be an aberrant *Coosia* p. 458, Lochman (1).

Crepicephalus or closely related genus p. 52, Traves (1).

Crepicephalus or related genus p. 85, Traves (2).

Crepicephalus & *C. ?* p. 42, Shaw & DeLand.

Crepicephalus etheridgei (Chapman) p. 36, SINGLETON in Harris & Thomas.

Crepicephalus etheridgei Chapman p. 158, Thomas & Singleton.

Crepicephalus expansus, *C. rectiformis* Resser spp. p. 20, LOCHMAN in Bridge.

Crepicephalus ? wyomingensis Miller referred to *Alokistocarella* p. 144, Shaw (3).

Croixana Nelson 1951 referred to Parabolinoïdidae fam. n. p. 454, Lochman (1).

Crotalocephalus see *Cheirurus*.

Crotalurus Volborth 1858 a subjective synonym of *Celmus* Angelin 1854, *C. barrandi* V. may be a synonym of *Celmus granulatus* A., *C. barrandi* of Schmidt 1907 a different sp. from *C. granulatus* p. 46; *C. ? strigatus* Weber and *C. n. sp.* Tjernvik 1952 probably belong to Glaphuridae p. 39, Jaanusson (4).

Crotalurus n. sp. Tjernvik 1952 referred to *Glaphurina ? insolita* sp. n. p. 265, Tjernvik.

Cryphina gdoumontensis Asselberghs p. 59, Schmidt.

Cryphops see *Phacops*.

Cryptolithus cf. *fittsi* Ulrich & Witington [sic] p. 56 pl. xxvi fig. 1, Ivanov & Myagkova.

'*Cryptolithus*', aff. *gibbifrons* (McCoy) p. 387, 'C.' sp. p. 389, Harper.

Cryptolithus (*Onnia*) *ornatus* (Sternb.) p. 488 pl. i fig. 3, Šnajdr.

Cryptolithus cf. *stelarusconii* Rusc. p. 10, Rusconi (1).

Cryptolithus sp. p. 71, *C.* listed p. 93, Kay.

Cryptolithus sp. p. 33, Nolan et al.

Cryptolithus sp. for *Trinucleus* (*C.*) *gibbosus* Elles 1940 [quod vide] partim from Lower Llanvirn p. 68 pl. ix fig. 16, Whittard.

Cryptonymus Eichwald 1825 (*non* 1840) discussed and suppression urged; *C. schlotheimii*, *C. weissii*, *C. panderi* & *C. lichensteinii* E. 1825

(non 1860) referred to Asaphidae but considered nomina dubia; *C. rosenbergii*, *C. rudolphii* & *C. parkinsonii* E. 1825 (non 1860) referred as nomina dubia to Illaenidae; *C. wahlenbergii* E. 1825 (non 1860) with synonym *Illaenus revaliensis* Holm 1886 to *Illaenus*, Jaanusson (2).

Cryptonymus Eichwald 1840 considered nomenclatorially invalid p. 61, Jaanusson (2).

Ctenocephalus Corda 1847 discussed p. 11, *C. probus* sp. n. p. 12 pl. i figs. 7–8 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Ctenopyge? p. 1348 pl. cxlvii figs. 14–15, Wilson.

Ctenopyge tumida Westergård listed p. 115, *C. spp.* p. 170, Tjernvik.

Cuyanaspis empozadensis Rusc. pl. v figs. 5–7, *C. expansus* R. pl. v fig. 8, Rusconi (2).

Cybele sp. p. 388 ff., Harper.

Cybele sp. p. 70, V. N. WEBER in Yavorsky.

Cybelinae — morphology discussed p. 422 text-fig. 2 (diagrammatic), Temple (1).

Cybeloides loveni var. *girvanensis* (Reed) p. 391, Harper.

Cybilooides [sic] sp. p. 153, Neuman.

Cyclognathina semiconvexa sp. nov. [nom. nud.] p. 8, Ivshin.

Cyclopyge latifrons sp. n. p. 259 pl. x figs. 9–11 text-fig. 42A, *C. gallica* sp. n. [compared with *Symphysurus*? Thoral 1935] p. 260 pl. x figs. 12–16 text-fig. 42B, *C. umberonata* (Angelin) text-fig. 42C Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Cyclopyge sp. [*C. aff. pachycephala* H. & C. on p. 485] p. 499, Šnajdr.

Cyclopyge sp. p. 391, Harper.

Cyclopyge sp. (sp. nov.) [undescr.] p. 258, Kielan.

Cyphaspides sp. p. 73 (80), Strnad (1).

Cyphaespis see *Otarion*.

Cyphaspis convexa Corda p. 37, *C. convexa*? p. 38 pl. i fig. 17, pl. ii figs. 13a–6, Chernysheva (1).

“*Cyphaspis*” cf. *craspedota* p. 1457, *C. sp.* p. 1452, Oliver.

Cyphoniscus Salter 1853 referred to Isocolidae, *C. socialis* S. lectotype selected and figured p. 1195 pl. cxxx figs. 1–9, 11–12, text-figs. 2 a–b (drawings), Whittington (5).

Cyrtometopus Angelin 1854 discussed, *C. priscus* sp. n. including *C. cf. clavifrons* of Skjeseth 1952 p. 266 pl. xi figs. 6–8 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Cyrtometopus gibbus Ang. var. *perconvexus* var. nov. [nom. nud.] p. 8, Ivshin.

Cyrtosymbole (*Calybole*) *antedistans* R. & E. Richter, *C. nepia* R. & E. R., *C. sp. ex aff. nepia*, ? *C. sp.* pp. 27–28, Müller.

Cyrtosymbole (*Waribole*) *avita* R. Richter text-fig. 14, *C. cf. warsteiniensis* R. & E. R. p. 218, Lewowicki.

Cyrtosymbole baiburensis Weber p. 160 pl. xli figs. 16–17, *C. librovitchi* W. p. 160 pl. xlii figs. 1–4 holotypes of both spp. figured, Weber (1).

Cyrtosymbole (*Waribole*) *baiburensis* Weber p. 251 pl. i fig. 11 text-fig. 2, Balashova.

Cyrtosymbole crebra Perna 1915 p. 187 pl. xlvi figs. 4a–b, 5, Weber (2).

Dalmania exophthalma Dreyfuss type of *Phacopidina* (*Dreyfussina*) subgen. nondescr. p. 394, HUPÉ in Choubert et al.

Dalmanites socialis p. 21, Fromaget.

Dalmanites solitaria Barrande type of *Kloučekia* (*Sokhretia*) subgen. n. p. 394, HUPÉ in Choubert et al.

Dalmanites vulgaris rare alkali elements content table 1, McKerrow et al. (2).

Dalmanites weaveri (Salter) holotype and hypotypes of S. 1864 listed p. 149, *D. sp.* for *Phacops w.* of S. 1864 partim (pl. 3 figs. 2–3) p. 150, Curtis.

Dalmanitina mucronata (Brongniart) p. 260 pl. iv figs. 3-5, *D. cf. olini* Temple p. 261 pl. iv figs. 6-8, origin and migration of *D. mucronata* discussed p. 268, Kielan.

Dalmanitina proaeva proaeva (Emmr.) pl. iv figs. 10-11, pl. v fig. 4, *D. proaeva socialis* (Barrande) lectotype chosen p. 512 pl. iv figs. 1-3, *D. proaeva ciliensis* subsp. n. p. 513 (530) pl. iv figs. 4-9 Ordovician (Middle) Bohemia, Šnajdr Sborn. úst. Úst. geol. 22 [Pal.] 1956.

Dalmanitina cf. robertsi (Reed) p. 391, Harper.

Dalmanitina socialis (Barrande) protaspides described p. 106 pl. xxiv figs. 6-12 text-fig. 2, Whittington (2).

Damesella recorded p. 85, Traves (2).

Damesella brevicaudata Walcott var. p. 280 pl. xl figs. 9a-b, Kobayashi (2).

Damesella sp. p. 52, Traves (1).

Damesellidae Kobayashi 1935 discussed p. 9 text-fig. 1 (phylogeny), Kobayashi (1).

Dartonaspis knighti p. 496, Frederickson.

Dasometopus Resser 1936 discussed p. 16, *D. breviceps* (Angelin) p. 17 pl. ii figs. 1-6, Chernysheva (2).

Deadwoodia duris (Walcott) p. 551 pl. lxv figs. 7-10, DeLand & Shaw.

Deadwoodia duris p. 41, Shaw & DeLand.

Dechenella (*D.*) *granulata* Richter lectotype figured pl. i fig. 5, R. & E. Richter (2).

Dechenella halli, *D. cf. macrocephalus*, *D. microgemma* p. 1452, *D. h.?* p. 1457, *D. clara* p. 1471, Oliver.

Dechenella minima Okubo MS [nom. nud.] p. 348, Okubo (1).

Dechenella salairica sp. n. p. 31 pl. ii figs. 2, 12, 17 Devonian (Lower and Middle), *D. batchatensis* sp. n. p. 33 pl. ii figs. 5, 8 Devonian (Middle), *D. cf. dombrowsiensis* Gürich p. 35 text-fig. 6, *D. cf. onyx* Richter p. 36 pl. ii figs. 3a-b U.S.S.R.

(Kuznetsk), Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Dechenella (*Paradechenella*) sp. p. 92, Z. M. MAKSIMOVA in Krivtsov.

Deckera ? recorded p. 22, Öpik (2).

Deiphon — alkali metal spectrum text-fig. 1, McKerrow et al. (1).

Deiphon forbesi — rare alkali elements content table 1, pl. xiii fig. A (spectrum), McKerrow et al. (2).

Deiracephalus buttsi Resser p. 20, LOCHMAN in Bridge.

Dellea see *Obrucheviaspis*.

Dellea p. 42, Shaw & DeLand.

Dellea cf. *D. butlerensis* Frederickson p. 552 pl. lxvi figs. 1-3, *D. saginata* sp. n. [DeLand] p. 552 pl. lxvi figs. 4-7, *D. suada* (Walcott) ? p. 554 pl. lxvi figs. 8-9 Cambrian (Upper) U.S.A. (Wyoming), DeLand & Shaw J. Paleont. 30 3 1956.

Desmetia cf. *annectans* (Walcott) p. 22, Nolan et al.

Diacanthaspis Whittington 1941 discussed p. 207, *D. cooperi* W. protaspis and development described p. 211 pl. iii figs. 1-21, pl. ix fig. 6, pl. xi figs. 16-18, text-figs. 8, 9A-D, *D. lepidus* sp. n. p. 216 pl. iv figs. 1-22, pl. v figs. 1-18, pl. viii fig. 15, text-figs. 8, 10A-B (reconstruction), *D. secretus* sp. n. p. 220 pl. vi figs. 1-22, pl. viii figs. 1-14, text-figs. 8, 11A-F (protaspis and development), *D. ulrichi* sp. n. p. 225 pl. viii figs. 1-29 text-figs. 8, 12A-D (development), *D. aff. ulrichi* p. 228 pl. ix figs. 1-5, 7-9 text-fig. 8, *D. orandensis* sp. n. p. 228 pl. x figs. 1-27, pl. xi figs. 1-15, 19-20, text-fig. 8, *D. scitulus* sp. n. p. 230 pl. xii figs. 1-20, pl. xiii figs. 1-17, text-fig. 8 Ordovician (Middle) U.S.A. (Va); *Acidaspis tremenda* Barrande tentatively excluded from *D.* p. 210, Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Dianops see *Phacops*.

Diaphanometopus lineatus (Dalmatian), *D. sp.* listed p. 279, Tjernvik.

Dicellocephalus richmondensis Walcott a synonym of *Litocephalus bilobatus* (Hall & Whitfield) [quod vide] p. 608, Palmer (2).

Dicranactis Corda 1847 type species selected *Bronteus gigas* C. [quod vide], *D.* a synonym of *Scutellum* (*Scutellum*) p. 99, R. & E. Richter (1).

Dicranurus Conrad 1841 referred to Miraspinae p. 248, *D. monstrosus* (Barrande) text-figs. 18A-C, Whittington (1).

Dicranurus Conrad 1841 discussed p. 517, *D. hamatus* (Hall 1859) p. 518 pl. ix figs. 9, 11-15, *D. monstrosus* (Barrande) text-figs. 4 A-C, Whittington (3).

Digonus see *Homalonotus*.

Dikellocephalus bilobatus Hall & Whitfield see *Litocephalus*.

Dikellocephalus lodensis Whitfield affirmed as type of *Saukia* [quod vide], *D. lodensis* of W. 1882 partim (pl. 27 fig. 13) referred to *Tellerina crassimarginata* (W.) p. 452, Lochman (1).

Dikellocephalid recorded p. 174, ÖPIK in Banks.

Dikellocephalid type trilobites p. 53, Traves (1).

Dikellocephalidae Miller 1889 discussed and taken to include *Briscoia*, *Dikellocephalus*, *Elkia*, *Osceolia* and *Walcottaspis*, classification of family into Dikellocephalinae and Osceolineae rejected p. 449, evolution text-fig. 2, Lochman (1).

Dikellocephalids recorded p. 53, ÖPIK (3).

Dikellocephalites Sun 1935 referred to Pterocephalidae p. 458, Lochman (1).

Dikellocephalus thwaitesi p. 177 ff., *D.* sp. p. 178 ff., *D. minnesotensis*, *D. oweni*, *D. marginatus* p. 179, Nelson.

Dikellocephalus recorded p. 47, ÖPIK (3).

Dikellocephalina dicraeura (Angelin) listed p. 278, Tjernvik.

Dikellocephalinidae discussed and considered related to Asaphoidae p. 453 text-fig. 5, Lochman (1).

Dimeropygidae see Mesotaphrasinae subfam. n.

Dindymene ornata Linnarsson p. 258 pl. iii figs. 1-2, *D. pulchra* Olin p. 258 pl. ii fig. 1, Kielan.

Dindymene cf. *ornata* (Linnarsson) p. 389, *D. cordai* Nich. & Eth. p. 391, Harper.

Dinesus ida Etheridge p. 155, *D.* sp. p. 156, Thomas & Singleton.

Dinesus ida Etheridge p. 17, ÖPIK (2).

Dinesus kirghizensis Lerm. p. 7, Ivshin.

Dionide cf. *richardsoni* Reed, *D. lapworthi* Nich. & Eth. p. 391, Harper.

Diplagnostus indianus Ruso. pl. i fig. 13, Rusconi (2).

Diplagnostus (Linguagnostus) kashachstanensis Ivsh. [not seen] p. 7, Ivshin.

Diplagnostus sp. p. 179, ÖPIK in Banks.

Diplagnostus sp. p. 12, PALMER in Nolan et al.

Diplapatocephalus finalis p. 27, Nolan et al.

Diplapatocephalus sp. p. 27, COOPER in Nolan et al.

Ditomopyge olsoni — apparent decrease during ontogeny in the ratio of pleural to axial segments in pygidium (Weller 1937) statistically not significant, correlation of genal spine and cheek lengths significant p. 1216 table 3, Shaw (4).

Ditomopyge sp. undet. p. 37, *D.* sp. undet. p. 39, WILLIAMS in Gilluly et al.

Dokimocephalidae — *Aldanaspis* Lermontova 1940 referred p. 57, Chernysheva (2).

Dokimocephalus pernasutus (Walcott) p. 19, PALMER in Nolan et al.

Doryagnostus incertus (Brögger) — *Ceratagnostus magister* Whitehouse a synonym p. 14, A. H. WESTERGÅRD in ÖPIK (2).

Dorypyge recorded p. 286, C. J. STUBBLEFIELD & O. P. SINGLETON in Benson.

“*Dorypyge*” *quadriiceps* (Hall & Whitfield) p. 645, Hazzard & Mason.

Dorypyge n. sp. [undescri.] p. 156, Thomas & Singleton.

Dorypyge sp. p. 12, PALMER in Nolan et al.

Dorypygella sp. nov. p. 280 pl. xl fig. 11 text-fig., Kobayashi (1).

Dorypygellinae — *Teinistion* and *Shantungia* referred p. 9, Kobayashi (1).

Dorypygidiae see *Bonnaria* and *Fordaspis* gen. n.

Drepanura ketteleri Monke var. including *Teinistion typicalis* Kobayashi 1931 (non M.) partim (pl. 20 fig. 17) p. 280 pl. xl fig. 10, Kobayashi (2).

Drevermannia cf. *brecciae* Richter p. 22, D. sp. p. 25, Müller.

Dreyfussina subgen. nondescr. of *Phacopidina* [quod vide].

Drumaspis sp. p. 496, Frederickson.

Drumaspis sp. p. 21, Palmer (1).

Drummuckaspis Prantl & Přibyl 1949 a subjective synonym of *Proceratocephala* P. & P. 1949 [quod vide] p. 515, Whittington (3).

Dudleyaspis Prantl & Přibyl 1949 referred to *Odontopleurinae* and discussed p. 234, *D. quinquespinosa* (Lake) text-figs. 14A-B, Whittington (1).

Dudleyaspis quinquespinosa (Lake 1896) lectotype selected p. 513 pl. lviii figs. 5, 15, 16, text-figs. 2A-B, Whittington (3).

Dulanaspis misspelling of *Dulanaspis* gen. n. p. 1337, Chugaeva.

Dulanaspis [spelt *Dulanasams* at descr.] gen. n. [Bronteidae] for type *D. levis* sp. n. p. 1337 text-fig. 2 Ordovician (Upper) U.S.S.R. (Kazakhstan), Chugaeva C.R. Acad. Sci. U.R.S.S. NS 111 6 1956.

Dunderbergia canadensis Kobayashi p. 1346 pl. cxlvii fig. 22 pars, Wilsson.

Dunderbergia halli Resser, *D. nitida*, *D. simulator*, "D." *granulosa* (Hall & Whitfield spp.) p. 19, *D. maculosa* (H. & W.) p. 22, PALMER in Nolan et al.

Dysplanus? spp. no. 1 and no. 2 p. 264, Tjernvik.

Dytremacephalus Palmer 1954 [recte 1955] referred to *Pterocephaliidae* p. 458, Lochman (1).

Dytremacephalus recorded p. 539, F. F. SABINS in Lochman (4).

Dytremacephalus [cf. on pl. expl.] *laevis* Palmer p. 1347 pl. cxlvii fig. 13, Wilson.

Eccoptochile (E.) *clavigera* (Beyrich) lectotype chosen p. 507 pl. i fig. 2, pl. v fig. 8, E. (*Eccoptochiloidea*) *tumescens* (Barrande) lectotype chosen, E. (*Eccoptochiloidea*) sp. p. 508 pl. iii fig. 10, *Eccoptochile* sp. pl. iv fig. 12, Šnajdr.

Eccoptochiloidea see *Eccoptochile*.

Ectenonotus cf. *E. raymondi* Holliday p. 2089, Langenheim et al.

Ectenonotus cf. *E. westoni* (Billings) p. 29, Nolan et al.

Edelsteinaspis cf. *ornata* Lerm. p. 96, Suvorova (1).

Edelsteinaspis ornatus Lerm. p. 270, Repina.

Edelsteinaspis sp. p. 135, Repina et al.

Edgellia Shaw 1950 a junior objective synonym of *Trinucleus* Murchison 1839 [quod vide] p. 51, Stubblefield & Whittington.

Edgellia Shaw 1950 a synonym of *Trinucleus* Murchison 1839 since its type *T. fimbriatus* M. is considered (designation of Vogdes 1890) to be type of *T.* p. 45, Whittard.

"*Ehmania*" *tetonensis* p. 41, Shaw & DeLand.

Ehmania weedi Resser p. 144, Shaw (3).

Ehmania sp. p. 21, Palmer (1).

Ehmania? sp. p. 2497 pl. i figs. 4-5, PALMER in Palmer & Hazzard.

Eifliarges caudimirus p. 372, R. & E. Richter (2).

Ekeraspis subgen. n. of *Plesiomesgalaspis* [quod vide].

Eldoradia prospectensis (Walcott), *E. linnarsoni* (W.) p. 16, PALMER in Nolan et al.

Eldoradia sp. p. 21, Palmer (1).

Elkia Walcott 1925 referred to Dikelocephalidae with synonym *Parabriscoia* Kobayashi 1935, *E. nasuta* W. with synonym (based on association of cranidia and pygidia) *P. dolichorachis* K. p. 449 pl. xvii figs. 5-14, Lochman (1).

Elkia nasuta (Walcott) (= *Parabriscoia* spp. of Kobayashi) p. 22, PALMER in Nolan et al.

Elleipocephalus Zenker 1833—proposed approval of Emmrich's 1839 emendation to *Ellipsocephalus* [quod vide], Poulsen (2).

Ellipsocephalooides p. 42, Shaw & DeLand.

Ellipsocephalooides sp. p. 496, Frederickson.

Ellipsocephalooides sp. p. 21, Palmer (1).

Ellipsocephalooides sp. indet. p. 554 pl. lxvii fig. 1, DeLand & Shaw.

Ellipsocephalus Zenker 1833—proposed approval of Emmrich's 1839 emendation from *Elleipocephalus*, and placing on Official List of Generic Names, *E. ambiguus* Z. a subjective synonym of *E. hoffi* (Schlotheim 1823) p. 132, *E. nanus* Barrande 1846 of *Sao hirsuta* B. 1846 p. 131, Poulsen (2).

Elliptocephala asaphoides Emmons p. 1376 pl. vi figs. 2-21 [including protaspides], *E.* sp. undet. listed p. 1341, Lochman (2).

Elrathia cf. *E. kingi* (Meek) p. 651, *E.* sp. p. 646, Hazzard & Mason.

Elrathia ? *occidentalis* (Walcott) p. 12, PALMER in Nolan et al.

Elrathiella spp. p. 16, PALMER in Nolan et al.

Elrathina recorded p. 43, Öpik (3).

Elrathina (undescribed) p. 17, Öpik (2).

Elrathina spp. p. 12, PALMER in Nolan et al.

Elvinia recorded p. 1559, Fisher (1).

Elvinia obliquensis Rusc. pl. iv fig. 1, Rusconi (2).

Elvinia roemeri (Shumard) pp. 19, 22, PALMER in Nolan et al.

Elvinia tetonensis p. 41, Shaw & DeLand.

Elvinia n. sp. [undescri.] p. 10, A. R. PALMER in McAllister.

Elvinia sp. p. 2497 pl. i figs. 1-2, PALMER in Palmer & Hazzard.

Elvinia sp. indet. p. 554 pl. lxvii figs. 9-10, pl. lxv fig. 1 pars, DeLand & Shaw.

Elvinia ?-like trilobite p. 23, Öpik (2).

Encrinurinae — morphology discussed p. 423 text-fig. 2 (diagrammatic), Temple (1).

Encrinurus Emmrich 1844—proposed to be placed on Official List of Generic Names and type species to be designated as *Entomostracites punctatus* Wahlenberg 1821 (*non* Brünnich 1781) [quod vide] lectotype selected and figured p. 260 pl. iii figs. 1-2, Tripp & Whittard.

Encrinurus Emmrich 1844—de facto type taken as *Entomostracites punctatus* Wahlenberg *non* Brünnich p. 58, *E.* sp. p. 59 pl. xxv fig. 3, Ivanov & Myagkova.

Encrinurus recorded p. 93, Kay.

Encrinurus cf. *multisegmentatus* (Portl.) p. 379, Jaanusson (6).

Encrinurus onniensis Whittard for *Calymene* ?? *punctata* of Murchison 1839 (pl. 23 fig. 8a) p. 149, Curtis.

Encrinurus punctatus rare alkali elements content table 1, McKerrow et al. (2).

Encrinurus punctatus var. *laosensis* p. 21, Fromaget.

Encrinurus rex Grabau p. 33, Chow.

Encrinurus cf. *seebachi* Fr. Schmidt p. 90 pl. i fig. 1, Martinsson.

Encrinurus sulfureanus Rusc. pl. x fig. 8, Rusconi (2).

Encrinurus sp. p. 7, Rusconi (1).

Endoaspis gen. n. (nom. n. for *Wutingia* Endo 1935 *non* Melichar 1926) for type *W. rectangulosa* E. Ordovician (Lower) Manchuria p. 448, Lochman J. Paleont. 30 3 1956.

Endocrania gen. n. [Kaolishanii-nae] p. 16 for type *Hystericurus convexus* Endo 1935, Kobayashi Japan. J. Geol. Geogr. 27 1 1956.

Entomolithus Linnaeus 1759 suppression urged, *E. paradoxus* L. 1759 (non 1753 which has no status) suppression urged as it may be a senior synonym of *Entomostracites spinulosus* Wahlenberg 1821 [which is the type of *Parabolina*], Poulsen (1).

Entomostracites Wahlenberg 1821 proposed suppression, *E. paradoxisimus* W. 1821 [lectotype selected] with objective synonym *Paradoxides tessini* Brongniart 1822 type of *Paradoxides* B. 1822 (selection of type attributed to Barrande 1852), *E. gibbosus* W. 1821 proposed as type of *Olenus* Dalman 1827, *E. spinulosus* W. 1821 type of *Parabolina* Salter 1849, Poulsen (1).

Entomostracites expansus Wahlenberg 1821 [so attributed rather than to Linnaeus 1768 or Dalman] lectotype selected, proposed as type species of *Asaphus* Brongniart 1822, Jaanusson (3).

Entomostracites extenuatus Wahlenberg 1821 type of *Megistaspis* (*Megistaspidella*) subgen. n. p. 71, Jaanusson (5).

Entomostracites punctatus Wahlenberg 1821—proposed to be validated (by suppressing *Trilobus punctatus* Brünnich 1781) and to be designated as type of *Enocrinurus* Emmrich 1844, Tripp & Whittard.

Eobronteus Reed 1928 discussed p. 103, *E. laticauda* (Wahlenberg 1818) pl. i fig. 1 (drawings), pl. iii figs. 11–15, R. & E. Richter (1).

Eobronteus laticauda (Wahlenb.) p. 375, Jaanusson (6).

Eodiscus Matthew 1896 so referred and type taken to be *Microdiscus schucherti* M. p. 5, *E. punctatus* (Salter) with synonym *M. eucentrus* Linnarsson p. 6 pl. i figs. 1–3, *E. palmatus* sp. n. Cambrian (Middle) U.S.S.R. (Siberia) p. 8 pl. i fig. 4, Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Eodiscus? (undescribed) p. 17, Öpik (2).

Eodiscus cf. *E. punctatus* (Salter) listed p. 1342 pl. v figs. 22–23, Lochman (2).

Eohomalonotus (*E.*) *bohemicus* (Barrande), *E.* (*E.*) *draboviensis* (Novák), *E.* (*Calymenella*) *parvulus* (B.) p. 506, *E.* (*C.*) aff. *parvulus* p. 507, Šnajdr.

Eohomalonotus *vicaryi* (Salter) p. 394, HUPÉ in Choubert et al.

Eosaukia? *walcotti* (Mansuy) for *Ptychaspis* w. M. p. 281 pl. xl figs. 1–4, Kobayashi (2).

Erbia granulosa Lerm., *E. sibirica* L., ex gr. s. p. 271, Repina.

Esmeraldina Resser & Howell 1938 —assignment of *Wanneria occidens* Walcott doubtful p. 61, Harrington.

Eteraspis p. 42, Shaw & DeLand.

Euarges see *Lichas*.

Euarges contusus p. 1452, Oliver.

Euarges parvula Novák 1884 p. 188 pl. xvii figs. 11a–b, Weber (2).

Eugonocare Whitehouse 1939—relations to *Olenaspella* gen. n. p. 1345, Wilson.

Eugonocare recorded p. 22, Öpik (2).

Eugonocare sp. p. 36, SINGLETON in Harris & Thomas.

Eugonocare sp. p. 158, Thomas & Singleton.

Eugonocare? sp. p. 368 (376) pl. i figs. 3–4, Lu (2).

Euloma laeve Angelin discussed and lectotype selected and figured p. 274 pl. xi figs. 1–3 text-fig. 45B, *E. ornatum* A. p. 275 pl. xi figs. 4–5 text-fig. 45A, *E.* spp. no. 1 and no. 2 p. 276 Ordovician (Lower) Sweden, Tjernvik.

Euloma ordinata sp. nov. [nom. nud.] p. 8, Ivshin.

Euplethagnostus Lermontova 1940 a synonym of *Pseudagnostus* p. 12, Ivshin.

Euptychaspis kirki Kobayashi p. 22, PALMER in Nolan et al.

Eurekia angustifrons (Walcott), *E. dissimilis* (W.), *E. granulosa* W., sp. p. 22, PALMER in Nolan et al.

Eurekia sp. p. 179 ff., Nelson.

Eurekia-like new genus [undescri.] Ordovician (Lower) U.S.A. (Nevada), COOPER in Nolan et al.

Eurekiidae discussed and taken to include *Eurekia*, *Bayfieldia*, *Corbinia*, *Maladia* and *Tostonia* p. 450 text-fig. 3, LOCHMAN (1).

Eurostina trigona Whitehouse p. 40, ÖPIK (3).

Evenkaspis marina Kramarenko pl. iii fig. 6, *E. ivanovae* K. listed p. 188, *E.* sp. pl. iv fig. 6 pars., IVANOVА et al.

Fabulaspis famosus Ivsh. [not seen] p. 7, Ivshin.

Falanaspis gen. n. [Selenecemidae] p. 272 for type *F. aliena* sp. n. p. 273 pl. xi figs. 19-21 text-fig. 44 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Fieldaspis minuta Rusc. pl. ii fig. 5, Rusconi (2).

Flexicalymene figured text-figs., Gerard.

Flexicalymene planimarginata (Reed) p. 387, *F.* [aff. added by hand in offprint from author] *quadrigata* (King) p. 391, Harper.

Flexicalymene sp. rare alkali elements content table 1, McKERROW et al. (2).

Forchhammeria elegans Lerm. and Tchern. [Chern.] [not seen] p. 72 pl. vii figs. 5-7, Chernysheva (2).

Fordaspis gen. n. [Dorypygidae] p. 1387 for type *Solenopleura nana* Ford 1878 holotype figured [records of Walcott 1886, 1891, and Resser 1937 excluded] p. 1387 pl. vii figs. 21-24, pl. viii figs. 12-22 Cambrian (Lower) U.S.A. (N.Y.), cf. *F. nana* for *Atops trilineatus* of F. 1875 (refigured) p. 1389 pl. vii figs. 26-27, *F. tumida* (Walcott) for *S. ?? tumida* W. 1887 holotype refiugured p. 1390 pl. vii figs. 19-20, *F.* sp. undet. listed p. 1342, LOCHMAN Bull. geol. Soc. Amer. 67 10 1956.

Fouchouia [sic] recorded p. 63, CASEY & GILBERT-TOMLINSON.

Fremontella gen. n. [Olenellinae] for type *Wanneria halli* Walcott lectotype chosen and refiugured p. 58 pl. xv figs. 1-3, 8-9 text-fig. 1C, HARRINGTON J. Paleont. 30 1 1956.

Fremontia Raw 1936 discussed, *F. fremonti* Walcott lectotype selected and sp. restricted p. 57 pl. xv fig. 6 text-fig. 1B; following spp. also referred to *F.*—*Olenellus canadensis* Walcott lectotype selected and sp. restricted [1910 pl. 38 figs. 4, 5, 7 excluded], *O. brevoculus* Resser & Howell, *Wanneria walcottiana buelnaensis* LOCHMAN as *F. b.* p. 58, HARRINGTON.

Fuchouia 2 spp. p. 10, ÖPIK (2).

Fuchouia n. sp. [undescri.] p. 156, THOMAS & SINGLETON.

Fuchouia ? listed p. 41, ÖPIK (3).

Gallagnostus solitarius Rusc. text-figs. 2a-b, Rusconi (2).

Genevievelia see *Ninaspis* gen. n.

Genevievelia marionensis Resser p. 20, LOCHMAN in BRIDGE.

Genevievelia ? sp. p. 21, PALMER (1).

Geragnostus see *Agnostus*.

Geragnostus bisectus (Matthew) vars. *typica* and *brevis* differ significantly in cephalic measurements, suggested interpretation as difference in sex p. 1222 tables 8-9 text-fig. 2, SHAW (4).

Geragnostus jahuelensis Rusc. text-figs. 1a-b, Rusconi (2).

Geragnostus olenensis sp. nov. [nom. nud.], *G.* ex gr. *sidenbladi* (Linns.) p. 8, Ivshin.

Geragnostus rufus Salter pl. cxlvii fig. 11, *G.* cranidia p. 1348; *G.* "cranidium" of Wilson 1954 (pl. 26 fig. 16) is a pygidium p. 1347, Wilson.

Geragnostus sidenbladhi (Linnarsson) types apparently lost p. 188 pl. i figs. 5-6 text-fig. 27A, *G. crassus* sp. n. for *Agnostus glabratus ingricus* of Wiman 1905 (non Schmidt) p. 190 pl. i figs. 7-8 text-fig. 27B, *G.* sp. aff. *crassus* for *G.* sp. REGNELL 1942 partim p. 191, *G. lepidus* sp. n. p. 191 pl. i figs. 9-10 text-fig. 27C, *G. wimani* sp. n. for *A. glabratus* of W. 1905 (non Angelin)

p. 192 pl. i figs. 11–12 text-fig. 27D, *G. explanatus* sp. n. p. 193 pl. i figs. 13–14, *G. toernquisti* (Holm) p. 194, *G.* sp. no. 1 p. 194, *G.* sp. no. 2 p. 194 pl. i fig. 15 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Geragnostus tumidosus (Hall & Whitfield) pp. 19, 22, *G. brevis* Palmer, *G.* sp. p. 22, PALMER in Nolan et al.

Gerastos Goldfuss 1843 discussed and considered a synonym of *Proetus* Steininger 1831 to which its type *G. laevigatus* G. (which is an objective synonym of *P. cuvieri* S.) is referred p. 351, *G. granulosus* G. (lectotype chosen and figured) a subjective synonym of *P. cuvieri* p. 367, R. & E. Richter (2).

Glaphuridae discussed and considered not related to Telephidae and Komaspidae, assignment of *Glaphurina* uncertain; *Crotalurus* n. sp. Tjernvik 1952 and *C. strigatus* Weber probably belong to Glaphuridae p. 39, Jaanusson (4).

Glaphurina discussed, assignment to Glaphuridae uncertain p. 39, Jaanusson (4).

Glaphurina? *insolita* sp. n. for *Crotalurus* n. sp. Tjernvik 1952 p. 265 pl. x figs. 20–21 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Globulaspis Reed 1931 may not be an Odontopleurid p. 283, Whittington (1).

Glossopleura lodensis see *Bathyuriscus howelli* var. *lodensis*.

Glossopleura mohavensis Resser referred to *Sonoraspis* p. 680, Stoyanow.

Glossopleura pedemontana Rusc. pl. i fig. 15, Rusconi (2).

Glossopleura sp. p. 645, Hazzard & Mason.

Glyphanellus see *Glyphasellus*.

Glyphasellus primus Ivsh., *G. latus* I., *G. rimus* I., *G. (Glyphanellus) margoritus* I. [none seen] p. 7, Ivshin.

Glyphaspis tetonensis p. 41, Shaw & DeLand.

Glyphaspis sp. p. 21, Palmer (1).

Glyptagnostus reticulatus (Angelini) from Nevada p. 22, PALMER in Nolan et al.

Glyptagnostus reticulatus (Angelini) from Queensland p. 23, Öpik (2).

Glyptagnostus reticulatus (Ang.) from Tasmania p. 52, Öpik (3).

Glyptagnostus reticulatus p. 181, ÖPIK in Banks.

Goldius elegans Peetz 1901 p. 187 pl. xlvi fig. 6, *G. nalivkini* Weber 1932 p. 187 pl. xlvi fig. 7, *G. yakovlevi* W. 1932 p. 188 pl. xlvi fig. 8, *G. costatus* Pusch p. 188 pl. xlvi figs. 9–10, Weber (2).

Goniagnostus nathorsti (Brögger) from Queensland p. 16, Öpik (2).

Goniagnostus nathorsti (Brögger) p. 89, *G. n.* var. *rostrata* Lerm. p. 88, Chernysheva (2).

Goniagnostus cf. *nathorsti* (Brögger) p. 286, C. J. STUBBLEFIELD in Benson.

Goniagnostus verrucosus Rusc. text-fig. 19, *G. rotundatus* R. text-fig. 20, *G. attenuatus* R. pl. ii fig. 13, Rusconi (2).

Goniagnostus? sp. p. 12, PALMER in Nolan et al.

Goycoia tellecheai Rusc. text-fig. 8, *G. limpida* R. text-fig. 9, Rusconi (2).

Grandagnostus glandiformis (Ang.) p. 88 pl. i fig. 9 pars, Chernysheva (2).

Granularia protolenorum Lerm. p. 85, *G.* sp. p. 63, *G.* illustrated pl. 2 fig. 4 partes 6, b, Suvorova (1).

Granularia sp. p. 135, Repina et al.

Granularica [sic] obrutchevi Polet. p. 271, Repina.

Griffithides claviger Scupin 1902 p. 163 pl. xlii figs. 19–20, *G. longiceps* var. *angusta* Woodward [cf. on pl. expl.] pl. xlii fig. 21, Weber (1).

Griffithides aff. *G. ornatus* Vogdes, *G.* sp. p. 43, Girty in Hewett.

Hamashania pulchra Kobayashi may belong to *Mareda* p. 448, Lochman (1).

Hamptonella Resser 1937 a synonym of *Kochiella* Poulsen [1927] to which its type *Ptychoparia fitchii* Walcott is referred p. 1392, Lochman (2).

Hamptonella gen. n. [no family assigned] p. 13 for type *Ptychoparia fitchii* Walcott, C. E. Resser Smithson. misc. Coll. 95 22 1937.

Hamptonella gen. n. error pro *Hamptonella* gen. n. Resser 1937, Z. R. 74 for 1937 11 1938 p. 35.

Haniwa ? recorded p. 67, Casey & Gilbert-Tomlinson.

Haniwa conica Kobayashi p. 280 pl. xl fig. 8, Kobayashi (2).

"*Harpes*" *costatus* Ang. p. 374, Jaanusson (6).

Harpes neogracilis R. & E. Richter 1924 p. 73 (80), Strnad (1).

Harpes reticulatus Corda p. 5 pl. i fig. 3 text-fig. 1, Chernysheva (1).

Harpes reticulatus Corda var. *altaica* Tschernyschew 1893 p. 186 pl. xvii fig. 1, Weber (2).

Harpes wegeliini ? Ang., *H.* sp. p. 65, V. N. WEBER in Yavorsky.

Harpides mediasiaticus sp. nov. [nom. nud.] p. 8, Ivshin.

Harpides rugosus (Sars & Boeck), *H.* spp. p. 268, Tjernvik.

Hemiarges recorded p. 92, Kay.

Hemirhodon serranus Rusc. pl. ii fig. 9, Rusconi (2).

Holcacephalus ? p. 22, Öpik (2).

Holcacephalus appalachius Resser, *H. tenerus* (Walcott) p. 21, Palmer (1).

Holdenia Cooper 1953 referred to Isoclididae, *H. typa* C. types refigured p. 1197 pl. cxxix figs. 12-17, pl. cxxx figs. 10, 13-15, text-figs. 3a-b (drawings), Whittington (5).

Holmia mickwitzii (Schmidt) Estonian forms discussed p. 116, Öpik (1).

Holmia cf. *mickwitzii* p. 47, Henningsmoen (3).

Holomeris Corda 1847 type species selected *Bronteus aulicus* C. [quod vide], *H.* a synonym of *Scutellum (Paralejurus)* C. p. 99, R. & E. Richter (1).

Holometopus see *Raymondaspis*.

Holotrichelus punctillosus Törnqv. p. 65, V. N. WEBER in Yavorsky.

Holteria recorded p. 20, *H.* ? p. 22, Öpik (2).

Holteria problematica (Walcott) p. 18, PALMER in Nolan et al.

Homagnostus recorded p. 23, Öpik (2).

Homagnostus ? recorded p. 173, ÖPIK in Banks.

Homagnostus tentatively identified p. 168, ÖPIK in Elliston.

Homagnostus acutus pl. cxlvii fig. 22 pars, Wilson.

Homagnostus jarillensis Rusc. text-fig. 35, *H. pehuenchensis* R. pl. iii fig. 1, *H. asperoensis* R. pl. iv fig. 14, Rusconi (2).

Homalonotus (Digonus) cf. rudersdorffensis R. & E. Richter pp. 94, 97, R. & E. RICHTER in Schmidt.

Homalopyge gen. n. [Asaphid] p. 73 for type *Asaphus stacyi* Schmidt 1898 Ordovician (Lower) Baltic & Sweden text-figs. 3A-B, Jaanusson Bull. geol. Instn Univ. Upsala 36 1 1956.

Homolichas see *Hoplolichas*.

Hoplolichas (Homolichas) angustus (Beyr.) p. 373, Jaanusson (6).

Housia vacuna (Walcott) ? p. 555 pl. lxvi fig. 14, DeLand & Shaw.

Housia vacuna ? p. 42, Shaw & DeLand.

Housia spp. p. 19, PALMER in Nolan et al.

Housiidae — possible relations to Asaphidae and Ceratopygidae p. 457 text-fig. 5, Lochman (1).

Huaquinchaia spinosa Rusc. pl. vii fig. 7, Rusconi (2).

Huarpagnostus huarpeanus Rusc. text-fig. 34, Rusconi (2).

Huilichia trispinata Rusc. pl. i fig. 6, Rusconi (2).

Hungaia puelchana Rusc. pl. iii figs. 2-3, Rusconi (2).

Hungaia ? sp. p. 22, PALMER in Nolan et al.

Hungaiidae discussed p. 453, Lochman (1).

Hunnebergia gen. n. [Asaphidae] for type *H. retusa* sp. n. p. 257 pl. x figs. 5–6 text-fig. 41B Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Hypagnostus andinus Rusc. pl. i fig. 12, *H. empozadensis* R. pl. iv fig. 11, *H. lasherensis* R. pl. iv fig. 12, *H. huilichensis* R. pl. vii fig. 12, Rusconi (2).

Hypagnostus parvifrons (Linnarsson) p. 12, PALMER in Nolan et al.

Hypagnostus sublatus Ivsh. [not seen] p. 7, Ivshin.

Hypagnostus truncatus (Brögg.) p. 86, *H. parvifrons* (Linrs.) p. 87, *H. brevifrons* (Ang.) p. 88, Chernysheva (2).

Hypagnostus n. sp. [undescr.] p. 158, SINGLETON in Thomas & Singleton.

Hypagnostus spp. p. 36, SINGLETON in Harris & Thomas.

Hysteropleura p. 42, Shaw & DeLand.

Hystricuraspis probus gen. et sp. nov. [nom. nud.] p. 8, Ivshin.

Hystricurus recorded p. 936, Sando.

Hystricurus convexus Endo 1935 type of *Endocrania* gen. n. p. 16, Kobayashi (1).

Hystricurus corralensis Rusc. text-fig. 41, Rusconi (2).

Hystricurus tuberculatus (Walcott) p. 11, J. BRIDGE & G. A. COOPER in McAllister.

Hystricurus sp. p. 27, COOPER in Nolan et al.

Hystricurus spp. p. 49, Bridge.

Idahoia Walcott 1925 referred to Idahoiidae fam. n. p. 459, Lochman (1).

Idahoia see *Otentella* gen. n.

Idahoia p. 42, *I. wyomingensis* p. 41, Shaw & DeLand.

Idahoia? recorded p. 53, Öpik (3).

Idahoia sp. A p. 99 pl. i fig. 17 Cambrian (Upper) U.S.A. (Mich.), Stumm.

Idahoia sp. indet. p. 555 pl. lxvii fig. 2 pars, DeLand & Shaw.

Idahoiidae fam. n. for *Idahoia*, *Bellaspidella*, *Comanchia*, *Pseudosaratogia*, *Saratogia* and *Wilbernia* p. 459 text-fig. 7, Lochman J. Paleont. 30 3 1956.

Idamea recorded p. 22, Öpik (2).

Iddingsia p. 42, Shaw & DeLand.

Iddingsia nevadensis Resser, *I. robusta* (Walcott), *I. similis* (W.) p. 19, PALMER in Nolan et al.

Iddingsia occidentalis sp. n. p. 555 pl. lxv fig. 14 Cambrian (Upper) U.S.A. (Wyoming), DeLand & Shaw J. Paleont. 30 3 1956.

Idiomesus sp. p. 22, PALMER in Nolan et al.

Illaenid trilobites (various) p. 33, Nolan et al.

Illaenidae Hawle & Corda 1847—three Eichwald 1825 spp. of *Cryptonymus* [quod vide] referred as nomina dubia p. 60, Jaanusson (2).

Illaeninae see *Zbirovia* and *Cekovia* gen. n.

Illaenurus quadratus p. 177 ff., *I. calvini* p. 179, *I. sp.* p. 180 ff., Nelson.

Illaenus Dalman 1827—proposed addition to Official List of Generic Names and protection by the suppression of *Cryptonymus* Eichwald 1825 [quod vide]; *I. wahlenbergi* (E. 1825) for *C. w. E.* with synonym *I. revaliensis* Holm 1886, Jaanusson (2).

Illaenus recorded p. 92, Kay.

"*Illaenus*" *holubi* sp. n. p. 495 (529) pl. i fig. 1 Ordovician (Middle) Bohemia; *I. panderi* Barrande with synonyms *I. laticeps* and *I. attenuatus* Hawle & Corda referred to *Stenopareia* p. 496, *I. aratus* Barrande type of *Zbirovia* gen. n. [quod vide] p. 490, *I. transfuga* B. type of *Cekovia* gen. n. to which are referred *I. distinctus* B. and *I. salteri* B. p. 493, Šnajdr Sborn. úst. Úst. geol. 23 [Pal.] 1956.

Illaenus jevensis Holm p. 23, *I. schmidti* Nieszk. p. 22, *I. intermedius* H. p. 24, Röömusoks (1).

Illaenus oriens Moberg & Segerberg referred tentatively to *Sympyurusina*; *I.?* sp. recorded p. 264, Tjernvik.

Illaenus oviformis Warburg, *I. cf. linnarsoni* Holm, *I. aff. angustifrons* H., *I. aff. dalecarlicus* W., *I. salairicus* Web., *I. latus* M'Coy, *I. sp.* pp. 65, 70, V. N. WEBER in Yavorsky.

Illaenus roemerii Volb., *I. angustifrons* Holm p. 373, *I. mascei* H. p. 379, Jaanusson (6).

Illaenus sp. listed p. 188 pl. viii fig. 3, Ivanova et al.

Illaenus sp. p. 159, Neuman.

Illaenus? sp. p. 58 pl. xxvi fig. 7, Ivanov & Myagkova.

Inouyna Poletayeva 1936 suggested reference to Antatasiidae p. 449, Lochman (1).

Inoyellaspis expectans Ivsh. [not seen] p. 7, Ivshin.

Inouyna [sic] mana Repina MS [nom. nud.] p. 270, Repina.

Iranaspidae subfam. n. [Leiostegidae] for *Iranaspis* and *Plethopeltella* p. 448, Lochman J. Paleont. 30 3 1956.

Iranaspis King 1937 referred to Leiostegidae (*Iranaspidae*) subfam. n. p. 448, Lochman (1).

Irvingella aff. *I. flohri* Resser p. 556 pl. lxvi figs. 10-12, *I. richmondensis* R. and *I. adamsensis* R. synonyms of *I. flohri*, DeLand & Shaw.

Irvingella gibba p. 41, *I. aff. I. flohri* p. 42, Shaw & DeLand.

Irvingella jorusconii Rusc. pl. iv fig. 6, *I. platycephala* R. pl. iv fig. 7, *I. obliquensis* R. pl. iv figs. 8-9, Rusconi (2).

Irvingella major (Ulrich & Resser) p. 22, *I. sp.* p. 19, PALMER in Nolan et al.

Isidreana tellecheai Rusc. p. 6, Rusconi (1).

Isidreana tellecheai Rusc. pl. x fig. 7, Rusconi (2).

Isidrella bispinata Rusc. pl. ii fig. 1, Rusconi (2).

Isocolidae Angelin 1854 discussed p. 1194 and taken to include *Isocolus*, *Cyphoniscus*, *Holdenia*, and possibly *Pradesia*, Whittington (5).

Isocolus sjögreni Angelin 1854 lectotype selected and figured p. 1194 pl. cxxix figs. 1-11, text-figs. 1a-b (drawings), Whittington (5).

Isocolus cf. *sjögreni* Ang. p. 65, V. N. WEBER in Yavorsky.

Isoteloides whitfieldi Raymond discussed and lectotype chosen p. 55; *I.?* *genaliticurus* Hintze type of *Stenorhachis* gen. n. p. 54, Hintze & Jaanusson.

Isotelus platyrhachis (Steinh.) p. 383 table II, Jaanusson (6).

Isotelus recorded p. 92, Kay.

Isotelus-group proposed for *Isotelus* and others p. 66, Jaanusson (5).

Isotelus spiculum Endo probably referable to *Asaphellus* or *Kayseraspis* and probably includes *A.?* *orientalis* E. partim [hypostome pl. 13 fig. 21] p. 18, Kobayashi (1).

Isotelus spurius Phleger, *I.?* sp. p. 2091, Langenheim et al.

Isotelus sp. p. 155, Neuman.

Isoxya n. sp. [undescr.] p. 126, Daily.

Ithyektyphus gen. n. [no family assigned, compared with *Cedarina*, *Trachycheilus* etc.] p. 144 for type *Marjumia?* *tetonensis* Miller 1936 restr. (non pl. 8 fig. 21), *I.?* *tipperaryensis* for *M.?* *t.* Miller, Shaw J. Paleont. 30 1 1956.

Jakutus cf. *quadriceps* Lerm. p. 96, J. sp. p. 114, Suvorova (1).

Judaiella sp. p. 269, Repina.

Jujuyaspis keideli borealis [nom. nud., called *J.* n. sp. in text] Ordovician (Tremadoc) Norway listed text-fig. 4 p. 52, Henningsmoen (3).

Kainella recorded p. 22, Nolan et al.

Kainella? *finalis* (Walcott) p. 11, J. BRIDGE & G. A. COOPER in McAllister.

Kaolishania Sun 1924 discussed p. 13, *K. pustulosa* S. pl. ii figs. 4a-c (drawings), *K.* sp. pl. ii fig. 14, *Paramansuyella granulosa* Endo 1937 referred to *K.* and may be a synonym [not only a homonym] of *K. granulosa* Kobayashi 1933, Kobayashi (1).

Kaolishiinae Kobayashi 1935 discussed and referred to Damesellidae p. 12, taken to include *Kaolishania*, *Mimana*, *Chosenia*, *Wutingia*, *Endocrania* gen. n., ? *Tasmanocephalus*, Kobayashi (1).

? *Kaskia chesterensis* Weller pp. 33, 35, J. M. WELLER in Gilluly et al.

Kassinius kassini Ivsh., *K. pensus* I. [not seen] p. 7, Ivshin.

Kayseraspis Harrington 1938 discussed and referred to *Megistaspis*-group p. 65, *Plesiomegalaspis* Thoral 1946 either a subgenus or a synonym p. 64, Jaanusson (5).

Kayseraspis Harrington 1938 may be a subgenus of *Asaphellus* [quod vide] p. 19, Kobayashi (1).

Kayseraspis sp. — suggested reference of *Asaphellus* [sp. undet.] and *Trigonocerca* [sp. undet.] of Wilson 1954 p. 1347, R. J. Ross in Wilson.

Kazelia Walcott & Resser 1924 referred to Pterocephaliidae p. 458, Lochman (1).

Keithiella solitariensis Russo, text-fig. 39, Russo (2).

Kendallia Berg 1953 referred to Parabolincoididae fam. n. p. 454, Lochman (1).

Kettneraspis see *Acantholoma*.

Kettneraspis see *Leonaspis*.

Kildiniella Lermontova gen. non-descr. [see Z.R. '78 11 p. 9] probably a misspelling of *Koldiniella* L. gen. nondescr. [quod vide].

Kindbladia sp. p. 22, PALMER in Nolan et al.

Kingstonia Walcott 1924 discussed p. 65, *K. antiqua* sp. n. p. 66 pl. vi fig. 10 Cambrian (Middle) U.S.S.R. (Siberia), Cherynsheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Kingstonia recorded p. 65, Casey & Gilbert-Tomlinson.

Kingstonia rotunda Resser, *K. walcotti* R. p. 20, LOCHMAN in Bridge.

Kingstonia spicata Lochman, *K.* spp. p. 21, Palmer (1).

Kingstonia spicata Lochman p. 556 pl. lxiii fig. 17, *K.* sp. indet. p. 557 pl. lxiii fig. 16, DeLand & Shaw.

Kingstonia spicata p. 42, Shaw & DeLand.

Kirkella vigilans (Whittington) p. 27, Nolan et al.

Klouceckia [sic] *phillipsi* (Barrande) lectotype chosen p. 510, Šnajdr.

Kloučekia see *Kloučekia*.

Kloučekia [recte *Kloučekia*] Delo classified into *K.* (*Kloučekia*) and *K.* (*Sokhretia*) subgen. n. for type *Dalmanites solitaria* Barrande p. 394, *K.* cf. *solitaria* recorded, HUPÉ in Choubert et al. C.R. Acad. Sci., Paris 242 3 1956.

Kobayashia taurus (Walcott) discussed p. 53, Hintze & Jaanusson.

Kochiella Poulsen 1937 [sic]—*Hamptonella* Resser 1937 a synonym p. 1392, *K. fitchi* (Walcott) [type of *H.*] holotype refigured p. 1393 pl. viii figs. 26–28, Lochman (2).

Kochiella see *Pedinocephalus* gen. n.

Kolbinella prima Repina MS [nom. nud.] p. 270, Repina.

Koldiniella gen. nondescr. [= *Kildiniella* quod vide], *K. latifrons*, *K. cambrensis* [nom. nuda] p. 62, E. V. LERMONTOVA in Yavorsky.

Koldinioidia sp. p. 282, Kobayashi (2).

Kolichapeltis [sic]—*Bronteus angusticaudatus* Etheridge & Mitchell probably belongs p. 150, Kobayashi & Igō.

Kolihapeltis see *Scutellum*.

Komaspidella recorded p. 1559, Fisher (1).

Koněprusia Prantl & Přibyl 1949 discussed p. 250, Whittington (1).

Kootenia listed p. 40, Öpik (3).

Kootenia boucheri [nom. nud.] p. 787, omitted Z.R. 93 11 (for 1955) Shaw (2).]

Kootenia eurekaensis Resser p. 12, PALMER in Nolan et al.

Kootenia fergusoni (Gregory) p. 155, Thomas & Singleton.

Kootenia jakutensis Lerm. p. 85, K. sp. p. 52 pl. 3 fig. 2 pars 6, Suvorova (1).

Kootenia modica (Whitehouse) p. 17, ÖPIK (2).

Kootenia troyensis Resser (types refigured) including in synonymy *Solenopleura nana* (non Ford) of Walcott 1886, 1887, 1891 & Resser 1937 p. 1391 pl. vii figs. 1-10, K. of. *K. marcoui* (Whitfield) p. 1392 pl. vii figs. 13-18; *K. fordi* (Walcott) may be a synonym of *K. marcoui* p. 1390; cf. K. sp. undet. listed p. 1342, Lochman (2).

Kootenia sp. p. 7, Ivshin.

Kooteniella slatkovskii (Sohm.) p. 270, Repina.

Kooteniella sp. p. 135, Repina et al.

Koptura cf. *lisani* (Walcott) p. 19, ÖPIK (2).

Koptura-like genus (2 spp.) recorded p. 287, A. A. ÖPIK in Benson.

Kormagnostus p. 42, Shaw & DeLand.

Kormagnostus seclusus (Walcott) p. 18, PALMER in Nolan et al.

Kormagnostus cf. *K. simplex* Resser, K. sp. p. 21, Palmer (1).

Kormagnostus sp. indet. p. 557 pl. lxiv figs. 12-13, DeLand & Shaw.

Kuanyangia Hupé 1952 [recte 1953] a synonym of *Redlichia* p. 282, Schindewolf (2).

Kujandaspis gen. n. [Familia incerta, compared with *Aphelaspis*], p. 45 for type *K. kujandensis* sp. n. p. 46 pl. iii figs. 14-21, 25, K. ex gr. k. pl. iii figs. 22-23, K. aff. k. pl. iii fig. 28, pl. iv figs. 14-15, K. *rarus* sp. n. p. 48 pl. viii figs. 12, ? 24 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Kujandina gen. n. [Familia incerta, compared with *Aphelaspis*, *Olenella*, *Kujandaspis*] p. 50 for type *K. taskudukensis* sp. n. p. 51 pl. viii figs. 13-16, K. ? *brevis* sp. n. p. 53 pl. iv fig. 18a Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Labiostria Palmer 1954 [recte 1955] referred to Pterocephaliidae p. 458, Lochman (1).

Labiostria platifrons Palmer — tentative reference of "Pterocephalina" of *P. grata* record of Wilson 1954 p. 1346, Wilson.

Labradoria cambridgensis sp. n. Cambrian (Lower) U.S.A. (N.Y.) p. 1394 pl. v fig. 12, Lochman Bull. geol. Soc. Amer. 67 10 1956.

Lancastria Kobayashi — *Paradoxides peregrinus* Whitehouse and *Oryctocephalus discus* W. may together represent a sp. of *L.* p. 17, ÖPIK (2).

Lannacus subgen. n. of *Megalaspides* [quod vide].

Lapidaria gen. n. [Asaphidae] p. 220 for type *L. tenella* sp. n. p. 221 pl. iv figs. 3-7 text-fig. 35A, *L. rugosa* sp. n. p. 222 pl. iv figs. 8-9 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Latenaspis egregius Repina MS [nom. nud.] p. 270, Repina.

Latireddlichia Hupé 1952 [recte 1953] a synonym of *Redlichia* p. 282, *L. saitoi* H. identical or close to *R. noetlingi* p. 298, Schindewolf (2).

Latiredlichidae Hupé a synonym of Redlichidae p. 289, Schindewolf (2).

Laudonia gen. n. [Wanneriinae] for type *L. bispinata* sp. n. Cambrian (Lower) Canada (B.C.) p. 60 pl. xv figs. 4-5 text-fig. 1F, *L. prima* (Lochman) for *Wanneria mexicana* p. L. p. 61, Harrington J. Paleont. 30 1 1956.

Leiagnostus espigonensis sp. n. p. 11 fig. 7 Ordovician (Lower)

Argentina (Mendoza), **Rusconi** Rev.
Mus. Hist. nat. Mendoza 9 1-2 1956.

Leiagnostus espinonensis Ruso. pl.
xii fig. 7, **Rusconi** (2).

Leiagnostus peltatus sp. n. for
Agnostus sp. Wiman 1905 (refigured)
p. 197 pl. i figs. 20-21 Ordovician
(Lower) Sweden, **Tjernvik** Bull. geol.
Instn Univ. Upsala 36 2-3 1956.

Leiocoryphe p. 42, **Shaw & DeLand**.

Leiocoryphe platycephala Koba-
yashi, L. ? sp. p. 22, **PALMER** in
Nolan et al.

Leiocoryphe sp. indet. p. 557 pl. lxiv
figs. 1-3, **DeLand & Shaw**.

Leiopyge laevigata (Dalman), *L. l.*
rugifera Westergaard, *L. l.* cf.
armata (Linnarsson) from Queens-
land p. 16, **Öpik** (2).

Leiopyge laevigata, *L. l. armata*
p. 185, **ÖPICK** in Banks.

Leiostegiidae see *Iranaspidinae*
subfam. n.

Leiostegium sp. p. 27, **COOPER** in
Nolan et al.

Lejopyge empozadense Rusc. pl. iv
fig. 10, **Rusconi** (2).

Leonaspis R. & E. Richter referred
to *Odontopleurinae* and discussed
p. 205, *L.* n. sp. [= *L. williamsi*
Whittington] text-figs. 7A-C, **Whit-
tington** (1).

Leonaspis R. & E. Richter 1917
discussed and preferred to *Acantha-
loma* Conrad 1840 p. 505, distinction
of Prantl & Přibyl's 1949 subgenera *L.*
(*Acanthalomina*) and *L.* (*Kettner-
aspis*) considered uncertain, *L.* (*K.*)
pigra holotype not found at Harvard,
L. coronata (Salter) pl. lix fig. 12 and
L. deflexa (Lake) so referred p. 506,
L. tuberculatus (Hall 1859) [so as-
cribed, but to Conrad on pl. expl.]
redescribed and syntypes refigured
p. 507 pl. lvii figs. 1-9, *L. williamsi*
sp. n. Devonian (Lower) U.S.A.
(Oklahoma) p. 509 pl. lvii figs. 10-16,
pl. lviii figs. 1-4, 6-7, **Whittington** J.
Paleont. 30 3 1956.

Leonaspis R. & E. Richter 1917—
proposed protection by suppressing
Acanthaloma Conrad 1840, and pro-
posed addition to Official List of
Generic Names, **Whittington** (8).

Leonaspis (*Kettneraspis*) *elliptica*,
♀ *L.* (*K.*) *aries* p. 372, **R. & E.**
Richter (2).

Leptoplastus sp. listed p. 169,
Tjernvik.

Lermontovia gen. n. [Protolenidae
(*Lermontoviinae*)] p. 37 for type
Protolenus dzevanovskii Lermontova
1951 p. 38 pl. i figs. 1-9, pl. ii figs. 1-2,
text-figs. 13 (reconstruction)—14 (6
growth-stages), *L. grandis* (L.) for
P. g. L. 1951 p. 45 pl. iii figs. 1-4
text-figs. 15a-b, *L. lenaica* sp. n.
p. 49 pl. iii figs. 5-6 text-fig. 16, *L.*
convexa sp. n. p. 51 pl. ii figs. 3-4
text-fig. 17, *L. clavata* (L.) for
Bergeroniellus ? *clavatus* L. 1951 p. 52
text-fig. 18 Cambrian (Lower)
U.S.S.R. (Yakutsk), **Suvorova** Trav.
Inst. paléont. Acad. Sci. U.R.S.S. 63
1956.

Lermontovia Suvorova 1956 dis-
cussed, *L. lenaica* S. p. 1103 pl. fig.
3B, *L. dzevanovskii* (Lermontova)
pl. fig. 3A text-fig. 2 (reconstruction),
L. grandis (L.) pl. fig. 36, *L. convexa*
S. p. 1104, pl. fig. 3r, *L. turkestanica*
sp. n. Cambrian (Lower) U.S.S.R.
(Turkestan) p. 1104 pl. fig. 3d, **Su-
vorova** C.R. Acad. Sci. U.R.S.S. NS 111
5 1956.

Lermontoviinae subfam. n. [Proto-
lenidae] p. 37 for *Lermontovia* gen. n.
and *Rinconia* Hupé, **Suvorova** Trav.
Inst. paléont. Acad. Sci. U.R.S.S. 63
1956.

Lermontoviinae Suvorova dis-
cussed p. 1103, **Suvorova** (2).

Levinia brachypygae Ruso. text-fig.
12, *L. isidrensis* R. text-fig. 15, *L.*
manantialensis R. text-fig. 25, *L.*
hornensis R. text-fig. 42, *L. simplex*
R. pl. i fig. 9, **Rusconi** (2).

Levinia simplex Rusc. p. 119,
Rusconi (3).

Lichas see N. gen. and sp.

Lichas cf. *scabra* p. 21, Fromaget.

Lichas (*Euarges*) *sibiricus* sp. n.
p. 39 pl. iii figs. 10-11, text-fig. 7
Devonian (Middle), *L.* (*E.*) *parvulus*
Novak var. *convexa* var. n. p. 41
pl. ii figs. 16a-b Devonian (Lower),
L. (*E.*) *altirhachis* sp. n. p. 42 pl. ii

fig. 15 Silurian (Upper) [?], *L.* (*E.*) sp. No. 1 p. 43 text-fig. 8 Silurian (Upper) U.S.S.R. (Kuznetsk), Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Lichas sp. p. 58 pl. xxvi figs. 3a, 6, *L.* ? pl. xxvi fig. 4, Ivanov & Myagkova.

Lichas sp. listed p. 188 pl. iv fig. 6 pars, Ivanova et al.

Lichengia Kobayashi 1942 referred to Saukiidae p. 451, Lochman (1).

Lichid protaspis for the protaspis assigned to *Arges consanguineus* by Beecher 1895 redescribed and figured p. 1201 pl. cxxxii figs. 1-6 text-figs. 1a-b, Whittington (6).

Linguagnostus see *Diplagnostus*.

Linguagnostus kjerulfi (Brögg.) p. 88, *L.* k. var. *danica* Lerm. p. 86, Chernysheva (2).

Liostracus Angelin 1854 discussed, type taken to be *L. aculeatus* A., *L. allachjunensis* Lermontova MS sp. n. p. 32 pl. iv figs. 12-14 Cambrian (Middle) U.S.S.R. (Siberia), *L.* sp., *L.* cf. *atlassowi* L., *L.* ? sp. p. 86, Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Liostracus see *Ptychoparia*.

Liostracus recorded p. 135, Repina et al.

Liostracus sp. p. 270, Repina.

Lisania recorded p. 19, Öpik (2).

Litagnostus recorded p. 65, Casey & Gilbert-Tomlinson.

Litagnostus recorded p. 22, Öpik (2).

Litagnostus pygidium pl. cxlvii fig. 12, Wilson.

Litocephalus Resser 1937 referred to Pterocephaliidae p. 458, Lochman (1).

Litocephalus Resser 1937—*Pterocephalina* R. 1938 a synonym, *L. bilobatus* (Hall & Whitfield) for *Dikellocephalus* b. [type of *P.*] holotype refigured with synonym (based on association of cranidia and pygidia) *Dicellocephalus richmondensis* Walcott [type of *L.*] holotype

refigured p. 608 pl. lxxiii figs. 1-6, 8, *L.* sp. p. 610 pl. lxxiii fig. 7, Palmer (2).

Litocephalus richmondensis (Walcott) pp. 19, 22, PALMER in Nolan et al.

Llanoaspis blandensis, buttsi, campbelli, clinchensis, peculiaris, ulrichi, virginica [with synonym *rogersvillensis*], *walcotti* (Resser spp.) p. 20, LOCHMAN in Bridge.

Llanoaspis undulata Lochman p. 21, Palmer (1).

Lloydolithus (*Protolloydolithus*) see *Protolloydolithus*.

Lobocephalina may be a congeneric geographic variant of *Conocephalina* p. 453, Lochman (1).

Loganellus recorded p. 71, Casey & Gilbert-Tomlinson.

Loganellus paramillanus Russo, pl. ii fig. 3, *L. simplicicostatus* [sic] R. pl. ii fig. 11, *L. ornatus* R. pl. ii fig. 12, *L. pichanus* R. pl. v fig. 10, *L. incisus* R. pl. vii fig. 9, Rusconi (2).

Loganopeltis depressaformis sp. nov. [nom. nud.] p. 8, Ivshin.

Lonchocephalus recorded p. 1559, Fisher (1).

Lonchodus portlocki (Barr.) p. 258 pl. iii fig. 7, Kielan.

Lonchodus sp. p. 2091, Langenheim et al.

Lonchodus sp. p. 272, Tjernvik.

Lopnorites Troedsson 1937 a synonym of *Proceratopyge* p. 21, Ivshin.

Lopnorites see *Proceratopyge*.

Lorenzella recorded p. 172, ÖPIL in Banks.

Lorenzella sp. p. 167, ÖPIL in Elliston.

Lotagnostus obscurus Palmer p. 22, PALMER in Nolan et al.

Lotagnostus trisectus (Salter) var. *memorabilis* var. nov. [nom. nud.] p. 8, Ivshin.

Lusatius R. & E. Richter 1941—*Protolenus radegasti* Czarnocki probably belongs p. 139, Samsonowicz.

Lusatiops (genus compared with) p. 126, *L.* n. sp. [undescri.] p. 126, Daily.

Lychas see N. gen. and sp.

Lyriaspis Whitehouse—*Clappaspis* [Deiss] a synonym p. 43, *L. alroyensis* (Eth.) p. 40; *Ptychoparia anderseni* Henningsmoen may be a *L.* p. 44, Öpik (3).

Lyriaspis several spp. p. 17, Öpik (2).

Maladia Walcott 1925 referred to Eurekiidae p. 450, Lochman (1).

Maladia? sp. p. 21, Palmer (1).

Maladioidea Endo 1937 referred to Pterocephaliidae p. 458, Lochman (1).

? *Maladiooides* (or ? *Changshania*) sp. p. 276 (283) pl. i fig. 9, Lu (1).

Mapania angusta (Whitehouse) p. 19, Öpik (2).

Mareda Kobayashi 1942—*Prosaukia*? *anomala* Ulrich & Resser and probably *Hamashania pulchra* K. referred p. 448, Lochman (1).

Marjumia? *tetonensis* Miller 1936 restr. type of *Ithyektyphus* gen. n. p. 144, *M.*? *tetonensis* M. partim (pygidium pl. 8 fig. 21) referred to *Olenoides incertus* nom. n. p. 145, *M.*? *tipperaryensis* M. referred tentatively to *I.*, Shaw (3).

Marrolithoides Williams 1948 considered a full genus pp. 49, 63, *M. simplex* (W.) holotype refigured pl. ix fig. 3, *M. arcuatus* sp. n. p. 64 pl. viii figs. 16–17, pl. ix figs. 1–2 Ordovician (Middle) Britain (Shropshire); *M. anomalis* W. referred to *Marrolithus* p. 59, Whittard Palaeontogr. Soc. [Monogr.] 110 1956.

Marrolithus Bancroft 1929 discussed p. 48, *M. craticulatus* sp. n. p. 51 pl. vi figs. 12–16, *M. primus* Williams 1948 (holotype refigured) discussed and considered that *M. inflatus* var. *incipiens* W. may be synonymous p. 53 pl. vii fig. 1, *M. bureui* (Oehlert 1895) may be composite sp. [allied in part to *M. craticulatus*, in part to *Marrolithoides simplex* (W.)] p. 54, *M. inflatus* W. holotype re-

examined and refigured p. 55 pl. vii fig. 5, *M. inflatus* var. *maturus* W. holotype refigured p. 55 pl. vii figs. 2–4, *M. favus* (Salter) syntypes refigured p. 55 pl. vii figs. 6–13 text-fig. 4 (diagram of fringe pits), *M. favus* var. *moderatus* W. holotype refigured p. 57 pl. vii fig. 14, *M. inornatus* sp. n. p. 58 pl. viii figs. 1–3, *M.* cf. i. pl. viii fig. 4, *M. anomalis* (W.) for *M. (Marrolithoides)* a. W. holotype refigured pl. vii fig. 16, *M.* cf. *anomalis* p. 59 pl. vii fig. 15, *M. arenarius* sp. n. including *M.* sp. Whittington 1941 p. 60 pl. viii figs. 5–8, *M.* cf. a. [pygidium attributed] pl. viii fig. 9, *M. bilinearis* sp. n. p. 61 pl. viii figs. 10–13, *M. ventriculatus* sp. n. p. 62 pl. vii figs. 17–18, *M. scalpriformis* sp. n. p. 62 pl. viii figs. 14–15 Ordovician (Middle) Britain (Shropshire); *M. ultimus* Bancroft 1949 type of *Costonia* gen. n. p. 50; *M. (Marrolithoides)* W. and *M. (Telaeomarrolithus)* W. considered separate genera [quae vide] p. 49, Whittard Palaeontogr. Soc. [Monogr.] 110 1956.

Marrolithus recorded p. 393, HUPÉ in Choubert et al.

Maryvillia Walcott 1916 referred to Asaphiscinae, discussed with synonyms *Protillaenus* Raymond 1937 and *Blountina* Lochman 1944; *M. arion* W. 1916 discussed with following as synonyms—*M. ariston* W. 1916 partim [pygidium pl. 64 fig. 5a], *Blountia angustata*, *B. arguta*, *B. widnerensis* Resser 1942 spp., *Blountia triangularis* Lochman, *B. westoni* Rasetti 1946, *Protillaenus marginatus* Raymond 1937; *Blountina eleanora* L. 1944 [type of *B.*] referred to *M.*; *M. ariston* W. restr. type of *Coosina* gen. n. p. 1267 with several spp. of *M.* as synonyms [see under *Coosina*], *M. loperi* R. 1942 referred to *C.*, *M. bristolensis* and probably *M. violaensis* R. considered typical of *Blountia* p. 1268, Rasetti (1).

Maryvillia recorded p. 53, Öpik (3).

Maryvillia arion (Walcott), *M. keithi* Resser, *M.* sp. for *Coosia athletes* of Resser 1938 p. 20, LOCHMAN in Bridge.

Maryvillia cf. *M. ariston* Walcott p. 21, Palmer (1).

Maustonia Berg 1953 referred to Parabolinoididae fam. n. p. 454, Lochman (1).

Maustonia see *Oalentella* gen. n.

Meeria Frederickson 1949 referred to Parabolinoididae fam. n. p. 454, Lochman (1).

Megalaspidella Kobayashi 1937 referred to *Megistaspis*-group p. 65, Jaanusson (5).

Megalaspides Brögger 1886 discussed p. 246, *M. (M.) dalecarlicus* (Holm) lectotype chosen and figured p. 247 pl. viii figs. 7–13 text-figs. 39C, 40A, *M. (M.)* sp. aff. d. p. 249, *M. (M.) paliformis* sp. n. p. 249 pl. viii figs. 14–15, *M. (M.)* sp. p. 278; *M. (Lannacus)* subgen. n. for type *M. nericiensis* Wiman 1905 lectotype chosen and figured p. 251 pl. ix figs. 1–5 text-fig. 40B, Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala **36** 2–3 1956.

Megalaspides may be referred to either *Megistaspis*-group or *Isotelus*-group p. 66, Jaanusson (5).

Megistaspis Angelin 1851 (June) non Bleeker 1851 (May) renamed *Megistaspis* nom. n. [quod vide] p. 60; *M. grandis* var. *lata* Törnquist 1884 considered nom. nud. and a homonym of *M. limbata* var. *lata* T. 1884, *M. multiradiata* A. 1851 (probably a synonym of *Megistaepis gigas* A. 1851) and *M. latilimbata* A. 1851 considered nomina dubia p. 72, Jaanusson (5).

Megalaspis (Paramegalaspis) see *Paramegalaspis*.

Megalaspis (Plesiomegalaspis) see *Plesiomegalaspis*.

Megalaspis lashereensis Rusc. pl. ix fig. 12, Rusconi (2).

Megalaspis planilimbata Angelin and *M. heroides* Brögger referred to *Plesiomegalaspis*, *M. stenorhachis* A. type of *Promegalaspides (Borogothus)* subgen. n. to which is referred *M. intacta* Moberg & Segerberg, Tjernvik.

Megistaspidella subgen. n. see *Megistaspis*.

Megistaspis gen. n. (nom. n. for *Megalaspis* Angelin 1851 [June] non Bleeker 1851 [May]) p. 60 for type *Trilobites limbatus* Boeck 1838 of which lectotype refigured and all later records excluded [these being probably referable to *M. l. elongata* Schmidt 1906] p. 70 pl. i figs. 1–3, *M. (Megistaspis)* subgen. n. p. 68 taken to include following spp.—*limbata* Boeck 1838, *hyorrhinus* Leuchtenberg 1843, *limbata* var. *minor*, *polyphemus* Brögger 1882, *l. var. lata* Törnquist 1884 (with synonym *polyphemus* var. *törnquisti* Schmidt 1906), *kolenkoi*, *mickwitzi*, ? *gibba* S. 1898, *limbata* var. *elongata*, *lawae*, *hyorrhina* var. *stacyi* S. 1906, *lepikuensis* nom. n. p. 69 for *polyphemus* var. *minor* S. 1906 (non *limbata* var. *minor* B. 1882), *laine* nom. n. p. 70 for *p. var. knyrkoi* S. 1906 (non *Megalaspis knyrkoi* S. 1906), *ingeriensis* nom. n. p. 70 for *p. var. lamanskii* S. 1906 (non *M. acuticauda* var. *lamanskii* S. 1906), *M. (M.) cf. elongata* (S.) text-fig. 1, *M. (M.)* n. sp. [undescr.] for Brögger 1882 pl. 9 figs. 3–4 p. 70; *M. (Megistaspidella)* subgen. n. p. 71 for type *Entomostracites extenuatus* Wahlenberg 1821 lectotype selected & refigured pl. i figs. 4–6 text-figs. 2A–B, following spp. also referred to subgen.—? *heros* Dalman 1828, *grandis* Sars 1835, *longicauda*, *centron* L. 1843, *gigas* Angelin 1851 (with probable synonym *multiradiata* A. 1851 nom. dub.), *explanata*, ? *rotundata* A. 1851, *acuticauda*, *rudis* A. 1854, *lambens* Törnquist 1884, ? *lavrovii* Schmidt 1898, *acuticauda* var. *obtusa*, *a.* var. *triangularis*, *a.* var. *lamanskii* S. 1906, *obtusicauda* Bohlin 1955 p. 72; *planilimbata*-group of *Megistaspis* recognised p. 67 for *M. planilimbata* A. 1851, Jaanusson Bull. geol. Instn Univ. Upsala **36** 1 1956.

Megistaspis-group proposed for *Megistaspis*, *Asaphellus*, *Thysanopyge*, *Megalaspidella*, *Kayseraspis* & *Paramegalaspis* p. 65, Jaanusson (5).

Megistaspis aff. *limbata* p. 129 ff., *M. l. lata* (Törnquist) p. 133 ff., *M. sp.* p. 173, Tjernvik.

Meisterella meister Ivsh. [not seen] p. 7, Ivshin.

Mendodiscus tuberculatus Rusc. text-figs. 4a–b, Rusconi (2).

Mendoparabolina brevicauda Rusc. pl. ii figs. 14, 15 [attributed hypostome], Rusconi (2).

Meneviella Stubblefield 1951 discussed p. 14, *M. venulosa* (Salter) p. 15 pl. i fig. 5, Chernysheva (2).

Menomonia sp. p. 21, Palmer (1).

Menoparia? *nericiensis* sp. n. possibly including *Apatocephalus serratus* var. *dubius* of Schmidt 1907 p. 206 pl. ii figs. 9-11 text-fig. 32B Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Mesodema Whitehouse 1939 a synonym of *Redlichia* p. 282, *M. venulosa* W. identical or close to *R. noetlingi* p. 298, Schindewolf (2).

Mesonacis bristolensis Resser type of *Bristolia* gen. n. to which is also referred *M. insolens* R. p. 59, Harrington.

Mesonacis fremonti (Walcott), *M.* sp. cf. *bristolensis* (Resser), *M.* sp. p. 646, Hazzard & Mason.

Mesotaphrasinae [corrected to Mesotaphraspidinae p. 77] subfam. n. [Dimeropygidae] p. 47 for *Mesotaphrasis* [recte *Mesotaphraspis*], *Chomatopyge*, and possibly *Clelandia* & *Panarchaeognathus*, Jaanusson Bull. geol. Instn Univ. Upsala 36 1 1956.

Mesotaphrasis [sic] Whittington and Evitt 1954 referred to Dimeropygidae (Mesotaphrasinae) [sic] subfam. n. p. 47, Jaanusson (4).

Mesotaphraspidinae see Mesotaphrasinae.

Mesotaphraspis see *Mesotaphrasis*.

Meteoraspis cf. *M. borealis* Lochman p. 21, Palmer (1).

Meteoraspis boulderensis sp. n. [DeLand] p. 557 pl. lxiii fig. 18, pl. lxiv figs. 4-6, *M. elongata* Lochman p. 558 pl. lxiv fig. 9, *M.* sp. indet. p. 558 pl. lxiv fig. 8 Cambrian (Upper) U.S.A. (Wyoming), DeLand & Shaw J. Paleont. 30 3 1956.

Meteoraspis elongata p. 42, Shaw & DeLand.

Microdiscus schucherti Matthew taken as type of *Eodiscus* M. p. 5, *M. eucentrus* Linnarsson a synonym of *E. punctatus* (Salter) p. 6, Chernysheva (2).

Mimana Kobayashi 1935 discussed and referred to Kaolishaniinae p. 14, Kobayashi (1).

Miraspinae R. & E. Richter with synonym Ceratocephalidae of Prantl & Přibyl discussed p. 235, taken to include *Miraspis*, *Ceratocephala*, *Proceratocephala*, *Whittingtonia*, *Dicranurus*, and tentatively *Selenopeltoides*, *Orphanaspis*, *Konéprusia* & *Ceratonurus*; see also Odontopleurid protaspis, Whittington (1).

Miraspis R. & E. Richter 1917 discussed p. 236, *M. mira* (Barrande) text-figs. 15A-D, ? *M.* sp. ind. p. 238 pl. xiv figs. 1, 7, Whittington (1).

Miraspis R. & E. Richter 1917 discussed p. 514, *M. mira* (Barrande) text-figs. 3A-D, *M.* sp. indet. p. 515 pl. ix figs. 1, 4, *M.* sp. for *Acidaspis terribilis* Reed 1914 partim (pl. 8 fig. 9) p. 515 pl. ix figs. 7-8, Whittington (3).

Modocia Walcott 1924—implied synonymy of *Semnocephalus* Resser 1942, *M. centralis* (Whitfield) 1877 with synonym *Solenopleura?* *weedi* Walcott 1899 [considered inseparable on basis of cranidial measurements text-figs. 1-4] p. 141, *M. oweni* (Meek & Hayden) a separate sp. on basis of measurements on holotype specimen to which sp. is restricted [other records referred to *M. centralis*], Shaw (3).

Modocia Resser 1935 [recte Walcott 1924] probably a junior synonym of *Armonia* Walcott 1924 p. 1343, C. LOCHMAN in Wilson.

Modocia centralis (Whitfield) p. 558 pl. lxiv fig. 10, *M.* sp. indet. p. 559 pl. lxiv fig. 11, DeLand & Shaw.

Modocia centralis p. 42, Shaw & DeLand.

Modocia manqueliana Rusc. pl. vi fig. 12, Rusconi (2).

Modocia nevadensis Palmer pp. 16, 18, PALMER in Nolan et al.

Monadina Barrande 1846 a contemporaneous subjective synonym of *Sao* B. 1846 which is formally given precedence p. 132, *M. distincta* B. 1846 a synonym of *S. hirsuta* B. 1846 p. 131, Poulsen (2).

Monocheilus? p. 42, Shaw & DeLand.

Monocheilus? sp. indet. p. 559 pl. lxvii fig. 2 pars, DeLand & Shaw.

Monocheilus (form with affinities to) p. 185, ÖPIK in Banks.

Monorakos ossacrum Kramarenko, *M. magnus* K. pl. iii fig. 7, *M. tunguskaensis* K., *M. mutabilis* K., *M.* sp. listed p. 188, Ivanova et al.

Moustonia see *Oalentella* gen. n.

Moxomia see *Parabolinella*.

Nankinolithus gen. nov. [nom. nud.] p. 6 (21) Ordovician (Upper) China, P'an.

Nasocephalus Wilson 1954—relations with *Agraulos* spp. from Scandinavia discussed p. 1342, Wilson.

Neochilonorria multicostata Rusc. pl. i fig. 4, *N. coronillensis* R. pl. iv figs. 3–4, *N. excavata* R. pl. iv fig. 5, Rusconi (2).

Neochilonorria sp. p. 119, Rusconi (3).

Neometacanthus see *Asteropyge*.

Neoredlichia Saito 1936 a synonym of *Redlichia* p. 282, Schindewolf (2).

Nepea narinosa Whitehouse p. 19, *N. aff. n.* p. 20, ÖPIK (2).

Nepea narinosa Whitehouse p. 156, Thomas & Singleton.

Nepeid recorded p. 286, O. P. SINGLETON in Benson.

Nepeidae undescribed genus p. 63, Casey & Gilbert-Tomlinson.

Nephranops see *Phacops*.

Nericiaspis robusta (Tjernvik) listed p. 134, Tjernvik.

Nieszkowskia variolaris (Linnarsson)—record of Schmidt 1881 pl. 9 fig. 2 tentatively excluded p. 419n, Temple (1).

Nileus armadillo (Dalman) p. 208 text-fig. 33D, *N. limbatus* Brögger including *N. a.* of Moberg and Segerberg 1906 (refigured) p. 208 pl. ii figs. 12–15 text-fig. 33A, *N. exarmatus* sp. n. p. 209 pl. ii figs. 16–21 text-fig. 33B, *N. orbiculatus* sp. n. p. 210 pl. ii figs. 22–23 text-fig. 33C, *N.* ? sp. p. 211 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Ninaspis gen. n. [Familia incerta, compared with *Generviellea*] p. 54 for type *N. tchernyshevae* sp. n. p. 55 pl. ix figs. 6, 6a Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Niobe Angelin 1851 discussed p. 223, *N. insignis* Linnarsson type probably lost p. 224 pl. iv fig. 10 text-fig. 36A, *N. incerta* sp. n. p. 225 pl. iv figs. 11–13 text-fig. 36B, *N. emarginula* A. lectotype selected and figured p. 226 pl. iv figs. 14–17 text-fig. 36C Ordovician (Lower) Sweden; following spp. referred to *Niabella* [quod vide]—*obsoleta* Linnarsson, *laeviceps* Dalman [see also *Platypeltoides*], *imparilimbata* Bohlin, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Niobe asiatica sp. nov., *N. saryarkensis* sp. nov. [nomina nuda] p. 8, Ivshin.

Niobe canteriana sp. n. p. 8 fig. 12 [referred hypostome] Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1–2 1956.

Niobe canteriana Rusc. pl. xii fig. 12, Rusconi (2).

Niobe homfrayi var. *smithi* (Stubblefield) 1933 types listed p. 147, Curtis.

Niabella Reed 1931 discussed p. 228, *N. obsoleta* (Linnarsson) for *Niobe* o. L. lectotype selected and figured p. 229 pl. v figs. 1 (cranium attributed)–2 text-fig. 37A, *N. sp. aff. obsoleta* no. 1 for *N. o.* of v. Post 1906 p. 230, *N. sp. aff. o.* no. 2 p. 231 pl. v fig. 3, *N. bohlini* sp. n. [for *Niobe laeviceps* of Wiman 1905, Moberg & Segerberg 1906 partim

(pl. 6 fig. 19), *N.* spp. nos. 1 and 2 W. 1905, and *N.* sp. aff. *o.* of Tjernvik 1952] p. 231 pl. v figs. 4-9 text-fig. 37B, *N. imparilimbata* (Bohlin) for *Niobe i.* B. p. 232 pl. v fig. 10, *N.* sp. aff. *i.* [for *Niobe laeviceps* of Skjeseth 1952 and *N.* sp. aff. *l.* of T. 1952] p. 233 pl. v figs. 11-14 text-fig. 37C, *N. laeviceps* (Dalman) p. 233 pl. v figs. 15-16 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Niobia sp. p. 234 pl. v fig. 17, Tjernvik.

Nixonella sp., *N.?* of *N.?* *wolfensis* Lochman p. 21, Palmer (1).

Notocoryphe andinus Rusc. text-fig. 40, Rusconi (2).

Novakaspis see *Otarion*.

Novaspis sp. (sp. nov.) [undescr.] p. 258, Kielan.

Obrucheviaspis Ivshin 1953 [not seen] discussed and compared with *Dellea* p. 70, *O. inornatus* L. holotype figured p. 71 pl. ix fig. 5 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin.

Octobronteus Weber 1945 — *Stoermeraspis* Prantl & Přibyl 1947 a subjective synonym p. 473, R. & E. Richter (3).

Odontocephalus selenurus, *O.* sp. p. 1457 ff., *O. bifidus* p. 1463, Oliver.

Odontochile Hawle & Corda 1847— proposed placing on Official List of Generic Names and designation of *Asaphus hausmanni* Brongniart 1822 as type [setting aside Vogdes' 1925 selection of *O. appланатус* H. & C. which is probably a subjective synonym of *A. h.*], Tripp & Whittard.

Odontopleura Emmrich 1839 discussed p. 196, *O. ovata* E. reconstruction text-fig. 4, Whittington (1).

Odontopleura? sp. Strnad 1955 p. 73 (80), Strnad (1).

Odontopleurid protaspis [? *Miraspinae*] p. 250 pl. xxi figs. 23-24, Whittington (1).

Odontopleurid trilobite recorded p. 264, Tjernvik.

Odontopleuridae Burmeister 1843 discussed and considered only of family status p. 193, classified into *Odontopleurinae*, *Apianurinae* sub-fam. n., *Miraspinae*, *Selenopeltinae* [quae vide]; *Ancyropyge* Clarke 1892 may belong to family p. 282, *Globulaspis* Reed 1931 may not p. 283, Whittington (1).

Odontopleuridae — possible relations with *Cheiruracea* and *Phacopacea* p. 428, C. J. STUBBLEFIELD in Temple (1).

Odontopleurinae Burmeister 1843 discussed with synonym *Acanthalommina* Prantl & Přibyl 1949 p. 195, Whittington (1).

? *Ogygiocaris brechensis* sp. n. p. 4 fig. 1 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Ogygiocaris brechensis Rusc. pl. xii fig. 1, Rusconi (2).

Ogygites annamensis p. 27, Fronaget.

Ogygopsis p. 42, Shaw & DeLand.

Oidalagnostus recorded p. 174, OPIK in Banks.

Oidalagnostus n. sp. [undescr.] p. 286, O. P. SINGLETON in Benson.

Olekmaspis gen. n. [Protoleninae] p. 126 for type *O. bobrovi* sp. n. p. 127 pl. xii figs. 1-7 text-fig. 45 Cambrian (Lower) U.S.S.R. (Yakutsk), Suvorova Trav. Inst. paléont. Acad. Sci. U.R.S.S. 63 1956.

Olenaspella gen. n. [no family specifically assigned, presumably Olenidae] p. 1344 for type *Parabolinella* [?] *evansi* Kobayashi 1936 lectotype selected & figured (K. 1938 pl. 16 fig. 11) pl. cxlvii figs. 20-21 ? Cambrian (Upper) Canada (B.C.), *O. occidentalis* (Wilson) for *P. o.* W. 1951 p. 1344, relations of *Olenaspella* to *Eugonocare* Whitehouse 1939 p. 1345, Wilson J. Paleont. 30 6 1956.

Olenaspella Wilson 1956 [called Wilson's new genus] referred to *Parabolinoididae* fam. n. and may be ancestral to Olenidae p. 455, Lochman (1).

Olenellinae see *Fremontella* and *Bristolia* genn. n.

Olenellus argentus Walcott lectotype selected, *O. argentus* W. partim (1910 pl. 40 fig. 14) excluded p. 56; *O. canadensis* W. (lectotype selected) & *O. brevoculus* Resser & Howell referred to *Fremontia* [quod vide] p. 57, *O. fremonti* W. partim (pl. 37 figs. 16, 19) to *Bristolia* sp. p. 57, Harrington.

Olenellus browni Etheridge excluded from *Xystridura* p. 40, Öpik (3).

Olenellus fremonti (Walcott), *O. cf. O. insolens* (Resser), *O. n. sp.* [undescr.] near *O. bristolensis* (R.) p. 37, RESSER & PALMER in Hewett.

Olenellus fremonti Walcott, *O. sp.* p. 8, PALMER in Nolan et al.

Olenellus thompsoni (Hall), *O. ? sp.* listed p. 1354, Lochman (2).

Olenellus spp. recorded from N.W. Greenland and Spitzbergen; Gen. et spec. indet. II of Winsnes 1955 is apparently identical with *O. ? sp.* II Poulsen 1932 p. 67, Poulsen (6).

Olenid — see “*Taenicephalus*” *longifrons* Kobayashi and “*T.*” *megalops* K. partim.

Olenid tentatively recorded p. 53, Öpik (3).

Olenidae see *Olenaspella* gen. n.

Olenidae — *Olenaspella* may be ancestral p. 455, Lochman (1).

Olenoides p. 41, *O.* (new) p. 42, Shaw & DeLand.

Olenoides australis Rusc. text-fig. 10, *O. chañariensis* R. pl. i fig. 8, *O. diamantensis* R. pl. iii figs. 8–9, Rusconi (2).

Olenoides borukaevi Ivsh., *O. opinatus* I., *O. sp.* I, *O. sp.* 2 [none seen] p. 7, Ivshin.

Olenoides convexus Lerm. p. 270, *O. sp.* p. 271, Repina.

Olenoides expansus (Walcott), *O. pugio* (W.) p. 12, *O. ? sp.* pp. 16, 18, PALMER in Nolan et al.

Olenoides faldeanus sp. n. p. 116 text-fig. 2 Cambrian Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 3–4 1956.

Olenoides incertus nom. n. for *Marjumia?* *tetonensis* Miller 1936 partim (pygidium pl. 8 fig. 21) lectotype [sic] p. 145 Cambrian (Middle) U.S.A. (Wyoming), Shaw J. Paleont. 30 1 1956.

Olenoides serratus (Rominger) pl. i fig. 3, Stoyanow.

Olenoides sp. p. 135, Repina et al.

Olenoides sp. indet. p. 46, Shaw (1).

Olenoides? sp. p. 21, Palmer (1).

Olentella gen. n. [Familia incerta, compared with *Orygmaspis*, *Wilbernia*, *Idahoia*, *Moustonia* [sic], *Parabolinoides*] p. 64 for type *O. olentensis* sp. n. p. 66 pl. v figs. 1–11, *O. aff. o.* pl. vi figs. 6, 10, *O. shidertensis* sp. n. pl. vi figs. 1–5, 7–9, 11, pl. vii figs. 1–8, *O. sp.* pl. vii figs. 9–10, 12, *O. ? sp.* 2 pl. vii fig. 11 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Olenus Dalman 1827 is strictly an objective synonym of *Paradoxides* Brongniart 1822 for which it was a substitute name; proposed to ICZN to designate *Entomostracites gibbosus* Wahlenberg 1821 as type of *O.* and to place *O.* on Official List of Generic Names, Poulsen (1).

Olenus — re-presentation of Kaufmann's 1933 data on lineages pp. 248–251 text-fig. 31, Simpson.

Olenus? *acanthurus* of Brögger 1882 (non Angelin 1854) see *Peltura praecursor*.

Olenus obliquensis Rusc. pl. v fig. 9, Rusconi (2).

Olenus sp. p. 21, *O. aff. transversus* Linnarsson p. 23, Öpik (2).

Olenus sp. undet. for *Parabolinella incerta* of Wilson 1954 p. 1343, *Olenus* s.s. for *P. [?]. evansi* immature form of Kobayashi 1938 (pl. 16 fig. 14) p. 1345, Wilson.

Onchocephalus parvus Walcott p. 8, PALMER in Nolan et al.

Onchonotellus gen. nov. name proposed provisionally without diagnosis for *Solenopleura subcincta* Lermontova 1951 p. 25, Lermontova Upper Cambrian trilobites and brachiopods from Bosche-Kulya, 1951 [omitted Z.R. 93 11].

Onchonotellus Lermontova 1951
recte gen. n. [Solenopleuridae] diagnosis given, for type *Solenopleura*
sulcincta L. 1951 p. 26, *O. abnormis*
sp. n. p. 28 pl. ix figs. 9–16 Cambrian
(Upper) U.S.S.R. (Kazakhstan),
Ivshin Upper Cambrian trilobites of
Kazakhstan Part I 1956.

Onchopeltis curcuncensis Ruse. pl.
vii fig. 5, Rusconi (2).

Onnia see *Cryptolithus*.

Onnia (Trinucleus) [sic] cf. *superba*,
O. (T.) gracilis rare alkali elements
content table 1, McKerrow et al. (2).

Onnia verrucosa sp. n. p. 9 fig. 11
(reconstruction) Ordovician (Lower)
Argentina (Mendoza), Rusconi Rev.
Mus. Hist. nat. Mendoza 9 1–2 1956.

Onnia verrucosa Ruse. pl. xii fig. 11,
Rusconi (2).

Opisthoparian trilobite p. 132,
Daily.

Orkekeia ornata Ruse. pl. ii fig. 4,
Rusconi (2).

Ormathops mirus sp. n. p. 511
(530) pl. i figs. 8–10 Ordovician
(Middle) Bohemia, Šnajdr Sborn. úst.
Úst. geol. 22 [Pal.] 1956.

Orometopus grypos sp. n. Ordovician
(Lower) Sweden p. 269 pl. xi
figs. 9–12 text-fig. 43B, *O. elatifrons*
(Angelin) text-fig. 43A, *O. sp.* p. 279;
O. e. of Moberg and Segerberg 1906
partim (pl. 7 figs. 4–5) referred to
Agerina praematura gen. et sp. n.
p. 200, Tjernvik Bull. geol. Instn Univ.
Upsala 36 2–3 1956.

Orphanaspis Prantl & Přibyl 1949
discussed p. 248, Whittington (1).

Orria sp. p. 12, PALMER in Nolan
et al.

Oryctocara aff. *geikiei* (Walcott) p.
43, Öpik (3).

Oryctocephalid new genus [un-
descr.] p. 43, Öpik (3).

Oryctocephalites cf. *typicalis* Resser
p. 43, Öpik (3).

Oryctocephalus discus Whitehouse
and *Paradoxites peregrinus* W. may
together constitute a sp. of *Lancas-
tria* p. 17; *O.* (undescribed) listed
p. 17, Öpik (2).

Oryctocephalus cf. *reynoldsi* and
other spp. p. 43, Öpik (3).

Orygmaspis Resser 1936 referred
to Parabolinoïdidae fam. n. p. 454,
Lochman (1).

Orygmaspis see *Oalentella* gen. n.

Osceolia Walcott 1914 referred to
Dikelocephalidae p. 449, Lochman (1).

Osceolia osceola p. 177 ff., Nelson.

Otarion recorded p. 6, P'an.

Otarion (O.) balanops, *O. (O.)*
unguloides ranunculum, *O. (Novakas-
pis) ceratophthalmum* p. 372, R. & E.
Richter (2).

Otarion (O.) convexum (Hawle &
Corda) p. 83 (88), Strnad (2).

Otarion (Otarion) hydrocephalum
(Roemer) discussed with characteristics
of subsp. p. 29, *O. (O.)*
hydrocephalum h. excluding the records of
Ferroniére 1920 [to *barrandei*] and Péneau 1928 [to *inter-
medium*] p. 32 text-figs. 1, 1a, *O. (O.)*
hydrocephalum barrandei (Hawle & Corda)
excluding the records of Couffon 1924 and Pillet 1949, 1951
[all to *intermedium*] p. 32 text-figs.
2, 2a, *O. (O.) convexum* (H. & C.)
p. 33 pl. ii figs. 2, 3, 6 text-figs.
4, 4a, *O. (O.) ferroniérense* [mis-
spelt *ferronierense* at descr.] sp. n.
Devonian (Middle) France (Anjou)
including *Cyphaspis gaultieri* of F.
1920 and C. 1924 (*non* Rouault) p. 34
pl. ii figs. 1, 4–5, text-figs. 6, 6a, *O. (O.)*
chauffouri Pillet 1948 [recte 1951]
p. 34 text-figs. 5, 5a, *O. (O.) gaultieri*
(Rouault) p. 35 text-figs. 7, 7a, *O. (O.)*
cf. *gaultieri* p. 36, *O. (O.)* sp. 1
for *O. sp.* Pillet 1951 (p. 19), *O. sp.* 2
p. 36 text-fig. 9, *O. sp.* 3 for *O. sp.*
Renaud 1942 p. 37, Pillet Bull. Soc.
géol. Fr. (6) 6 1–3 1956.

Otarion sp. p. 1034, Swartz &
Whitmore.

Pachyaspis recorded p. 173, Öpik
in Banks.

Paedeumias fragments from N.W.
Greenland p. 67, *P. hansenii* Poulsen
from Scotland p. 68, Poulsen (6).

Paedumias [sic] *nevadensis* (Walcott)
p. 37, RESSER & PALMER in
Hewett.

Paedumias [sic] *nevadensis* (Walcott), *P.* sp. p. 8, PALMER in Nolan et al.

Pagezia recorded p. 173, ÖPIK in Banks.

Pagezia connexa (Walcott) p. 1382 pl. v figs. 1-6, *P. prindlei* sp. n. Cambrian (Lower) U.S.A. (N.Y.) p. 1382 pl. v figs. 7-10, Lochman Bull. geol. Soc. Amer. 67 10 1956.

Pagezia significans (Eth.), *P. aff. s.* p. 40, *P. cf. s.* p. 42, ÖPIK (3).

Pagezia cf. significans (Etheridge) p. 32, ÖPIK in Ivanac.

Pagezia cf. significans (Etheridge) p. 17, ÖPIK (2).

Pagezia cf. significans (Etheridge) p. 66, Casey & Gilbert-Tomlinson.

Pagezia sp. p. 167, ÖPIK in Elliston.

Pagezides elegans Rasetti listed p. 1354, Lochman (2).

Pageziellus lenicus (Toll) p. 67, *P. tolli* Lerm. p. 85, Suvorova (1).

Pagezina primaeva Lerm. p. 67, *P. sp. cf. primaeva* Lerm. p. 45, *P. sp. p. 49*, *P. glabrata* L. p. 96, Suvorova (1).

Pagezina rjonsnitzkii Lerm. p. 271, *P. sp. p. 270*, Repina.

Pagezina rjonsnitzkii Lerm. p. 135, Repina et al.

Pagodia cf. buda Resser & Endo p. 65, Casey & Gilbert-Tomlinson.

Palaolenus [sic] sp. p. 271, Repina.

Panarchaeogonus Öpik 1937 may belong to Mesotaphraspidinae sub-fam. n. p. 47, Jaanusson (4).

Papyriaspis recorded p. 41, Öpik (3).

Papyriaspis lanceola p. 19, *P. aff. l.* p. 20, Öpik (2).

Paraaulacopleura see *Aulacopleura*.

Parabasiliacus powisi (Murchison) p. 387 ff., Harper.

Parabolina Salter 1849—proposed placing on Official List of Generic Names with type *Entomostracites spinulosus* Wahlenberg 1821, Poulsen (1).

Parabolina acanthura p. 52, Henningsmoen (3).

Parabolina sp. p. 8, Ivshin.

Parabolina sp. undet. listed p. 1343 pl. viii fig. 23, Lochman (2).

Parabolinella incerta (Rasetti) record of Wilson 1954 referred to *Olenus* sp. undet. p. 1343, *P. [?] evansi* Kobayashi 1936 type of *Olenaspella* gen. n. to which is also referred *P. occidentalis* W. 1951 p. 1344, *P. [?] evansi* immature form of K. 1938 *partim* (pl. 16 fig. 14) may belong to *Olenus* s.s. p. 1345, *P. triarthroides* record of W. 1954 may belong to *P. ("Moxomia") hecuba* (Walcott) [suggestion of H. J. Harrington] p. 1348, Wilson.

Parabolinella pentacantha Russo. pl. ii fig. 2, Rusconi (2).

Parabolinella triarthroides Harrington — statistical comparison of sample from Vermont with holotype, differences not significant p. 1210 table 1 text-fig. 1 (relative growth), Shaw (4).

Parabolinella sp. p. 19, *P. spp. p. 22*, PALMER in Nolan et al.

Parabolinella sp. p. 200, *P. ? sp. no. 1*, *P. ? sp. no. 2* for Trilobite (pl. 7 fig. 15) of Wiman 1907 p. 201, Tjernvik.

Paraboloides Frederickson 1949 discussed and referred to Paraboloididae fam. n. p. 454, Lochman (1).

Paraboloides see *Olenella* gen. n.

Paraboloididae fam. n. for *Paraboloides*, *Bernia*, *Croixana*, *Kendallia*, *Maustonia*, *Meeria*, *Orygmaspis*, *Psalaspis*, *Stigmacephalus*, and [*Olenaspella*] p. 454, relations of genera text-fig. 4, Lochman J. Paleont. 30 3 1956.

Parabolinopsis mariana Hoek for *Andesaspis argentinensis* Kobayashi *partim* p. 1347, H. J. HARRINGTON in Wilson.

Parabriscoia Kobayashi 1935 a subjective synonym of *Elkia* Walcott 1925, *P. dolichorachis* K. a synonym of *E. nasuta* W. [quod vide] p. 449, Lochman (1).

Parabriscoia castellanosii Russo. text-fig. 37, Russo (2).

Parabriscoia spp. of Kobayashi referred to *Elkia nasuta* (Walcott) p. 22, PALMER in Nolan et al.

Paracedaria montanensis (Duncan) p. 21, Palmer (1).

Paradechenella see *Dechenella*.

Paradoxiden Emmrich 1844—proposed suppression in favour of *Paradoxides* [corrected to *Paradoxididae*] Corda 1847, Poulsen (1).

Paradoxides Brongniart 1822 suggested to be placed on Official List of Generic Names with type [selection attributed to Barrande 1852] *Entomostracites paradoxissimus* Wahlenberg 1821 [lectotype selected p. 8], *P. tessini* Brongniart an objective synonym of *P. paradoxissimus*, Poulsen (1).

Paradoxides bennetti p. 295, Hutchinson.

Paradoxides davidi rare alkali elements content table 1, McKerrow et al. (2).

Paradoxides hicksi Salter p. 18 pl. i figs. 10–12, Chernysheva (2).

Paradoxides peregrinus Whitehouse and *Oryctocephalus discus* W. may together constitute a sp. of *Lancastria* p. 17, Öpik (2).

Paradoxididae attributed to Corda 1847 rather than to Emmrich 1844 whose usage [as *Paradoxiden*] it is suggested should be suppressed, Poulsen (1).

Parairvingella angustilimbata Kobayashi, *P. eurekensis* Resser p. 19, P. sp. p. 22, PALMER in Nolan et al.

Paralejurus see *Scutellum*.

Parakoldinioidea Endo 1937 affinities discussed, *P. typicalis* E. p. 18 pl. ii figs. 10–12, 13 (reconstruction); *P. concavolimbata* E. probably referable to *Tingocephalus* p. 13, Kobayashi (1).

Paramansuyella granulosa Endo referred to *Kaolishania* and probably a synonym [sic] of *K. granulosa* Kobayashi p. 13, Kobayashi (1).

Paramegalaspis Thoral [considered nom. nud. 1935 as no type was indicated] discussed and referred to *Megistaspis*-group, type designated as *Megalaspis (P.) immarginata* T. 1935; *P. frequens* T. probably belongs to *Plesiomegalaspis* p. 64, Jaanusson (5).

Paramicmacca siberica Lermontova p. 49 pl. ii fig. 4 pars Δ, pl. iii fig. 3 pars δ, Suvorova (1).

Paraolenoides medoevi Ivsh., *P. kassini* I., *P. vodorezovi* I. [none seen] p. 7, Ivshin.

Parapilekia speciosa (Dalman) listed p. 279, Tjernvik.

Parapolliella sulcata Tschern. [not seen], *P.* sp. p. 270, Repina.

Parapolliella sp. p. 134, Repina et al.

Pararaia (forms belonging to or allied to) pp. 108, 130, *P. tatei* (Woodward) discussed p. 131, Daily.

Pararedlichia Hupé 1952 [recte 1953] a synonym of *Redlichia* p. 282, *P. pulchella* and *P. rochi* H. identical or close to *R. noetlingi* p. 298, Schindewolf (2).

Parehmania (forms apparently referable to) recorded p. 672, C. R. LONGWELL in Palmer (3).

Pareops Hupé 1952 [recte 1953] a synonym of *Redlichia* p. 282, Schindewolf (2).

Parevenkaspis egloni Kramarenko listed p. 188, Ivanova et al.

Peachella iddingsi (Walcott) p. 8, PALMER in Nolan et al.

Pedinocephalus gen. n. [Familia incerta, compared with *Amecephalus* & *Kochiella*] p. 57 for type *P. bublichenkoi* sp. n. p. 58 pl. ii figs. 1–8, *P. kasachstanensis* sp. n. p. 60 pl. ii figs. 9–10, ? 11, 12, *P. bykovae* sp. n. p. 62 pl. i figs. 24–26, 28–29, *P.* sp. pl. i fig. 27 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Peltoura Milne Edwards 1840—proposed validation of Burmeister's 1843 spelling emendation to *Peltura*, Stubblefield (5).

Peltura Milne Edwards 1840—proposed to validate Burmeister's 1843 spelling emendation (from *Peltoura*) and to place the genus on the Official List of Generic Names p. 253, Stubblefield (5).

Peltura minor (Brögger) listed p. 115, *P. scarabaeoides* p. 122, *P. s. acutidens* B. p. 118, *P. ? norwegica* (Moberg & Möller) p. 277, Tjernvik.

Peltura praecursor Westergaard 1909—proposed to be designated as type of *Protopeltura* Brögger 1882, Henningsmoen (2).

Peltura sp. p. 8, Ivshin.

Pemphigaspis appalachia Resser p. 20, LOCHMAN in Bridge.

Periomma sp. p. 8, PALMER in Nolan et al.

Peronopsis recorded p. 173, ÖPIK in Banks.

Peronopsis p. 42, Shaw & DeLand.

Peronopsis elkedraensis (Eth.), *P. sp.* p. 40, *P. scutalis* (Salter) p. 43, ÖPIK (3).

Peronopsis cf. *elkedrensis* (Etheridge) p. 32, ÖPIK in Ivanac.

Peronopsis fallax (Linns.), *P. f.* var. *ferox* Tullb. and forma *magna* Lerm. p. 86, Chernysheva (2).

Peronopsis fallax (Linnarsson) var. *sinopsis* Ivsh. [not seen] p. 7, Ivshin.

Peronopsis jarillensis Rusc. pl. iii fig. 7, Rusconi (2).

Peronopsis normata Whitehouse p. 17, ÖPIK (2).

Peronopsis cf. *normata* (Whitehouse) p. 156, *P. sp.* p. 155, Thomas & Singleton.

Peronopsis cf. *quadrata* (Tullberg) p. 286, O. P. SINGLETON in Benson.

Peronopsis sp. p. 12, PALMER in Nolan et al.

Peronopsis spp. p. 63, Casey & Gilbert-Tomlinson.

Phacopacea discussed, close relations to Cheiruracea postulated, Temple (1).

Phacopid fragments p. 80, Strnad (1).

Phacopid protaspis for the form referred to *Acidaspis tuberculatus* by Beecher 1893 (refigured) p. 105 pl. xxiv figs. 1–5 text-fig. 1, Whittington (2).

Phacopidae recorded p. 6, P'an.

Phacopidae — removal of Pterygotropinae tentatively suggested p. 426, Temple (1).

Phacopidella *ductifrons* R. & E. Richter p. 24, Müller.

Phacopidella *limaria* Perna 1915 p. 191 pl. xlix figs. 6–7, Weber (2).

Phacopidina Bancroft classified into *P. (Phacopidina)* and *P. (Dreyfussina)* subgen. nondescr. for type *Dalmania exoptalma* Dreyfuss p. 394, Hufé in Choubert et al. C.R. Acad. Sci., Paris 242 3 1956.

Phacopoidae Richter 1932 used in preference to Cheiruroidea ÖPIK 1937 for Calymenids, Cheirurids, Pliomerids, Phacopids etc. p. 109, Whittington (2).

Phacops recorded p. 60, Schmidt.

Phacops *accipitrinus* (Phillips 1836) [sic] with synonym *P. bergicus* Drevermann 1902 p. 159 pl. xli figs. 6–7, Weber (1).

Phacops *altaicus* Tschernyschew 1893 p. 189 pl. xlvi figs. 4a–c, 5a–c, *P. turanicus* Weber 1932 p. 190 pl. xlvi figs. 6a–c, pl. xlii figs. 1a–b, *P. granulatus* Münster 1840 p. 190 pl. xlii figs. 2a–c, 3a–b, Weber (2).

Phacops *cristata*, *P. pipa*, *P. sp.* p. 1452, Oliver.

Phacops (*Phacops*) *cryptoides* (R. & E. Richter), *P. (Cryptophops) acuticeps* (Kayser) p. 21, *P. (C.) cryptothalmus* (Emmerich) [sic] p. 25, *P. (C.) ensae* R. & E. R. p. 28, *P. (Nephronops) incisus* *incisus* (Roemer) p. 22, *P. (Trimeroccephalus) mastophthalmus* (Reinh. R.) p. 23, *P. (Dianops) limbatus* (Reinh. R.), *P. (D.) sp.* ex aff. *griffithides* R. & E. R. p. 28, *P. (D.) sp.* p. 26, Müller.

Phacops cf. *glockeri* p. 21, Fomagat.

Phacops (Phacops) granulatus (Mstr) p. 218 text-fig. 15, *P. (Diaphlops) anophthalmus* (Frech) p. 218 text-fig. 16, Lewowicki.

Phacops khatangensis Web., *P. stokesi* M. Edw. listed p. 188, *P. quadrilineata* Ang. var. *khatangensis* W. pl. viii figs. 2a, 6, b, Ivanova et al.

Phacops [? *Phacops* on pl. expl.] *llanensis* sp. n. p. 6 fig. 4 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Phacops llanensis Rusc. pl. xii fig. 4, Rusconi (2).

Phacops nonakai sp. n. Devonian (Middle) Japan (Iwate) p. 43 pl. iii figs. 11a-b, Okubo Japan. J. Geol. Geogr. 27 1 1956.

Phacops rana Green [excluding record of Groth 1912] p. 49 pl. iii figs. 1a-5, *P. fecundus* Barrande p. 51 pl. iii fig. 6, *P. sublatifrons* sp. n. for *P. latifrons* of Peetz 1901 p. 52 pl. iii figs. 4, 5, 8, 9, 13 Devonian (Middle) U.S.S.R. (Kuznetsk), *P. aff. shanensis* Reed p. 55 pl. ii fig. 11 text-fig. 11, Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Phacops raymondi Delo p. 510, Whittington (3).

Phacops (P.) schlotheimi Brönn pl. ii figs. 10-12 (sections), *P. (P.) argus* p. 373, R. & E. Richter (2).

Phacops weaveri Salter referred to *Dalmanites* [quod vide] p. 149, *P. w.* of S. 1864 partim (pl. 3 figs. 2-3) to *D. sp.* p. 150, Curtis.

Phacops s. str. 2 spp. p. 348, Okubo (1).

Phaetonellus Novák 1890 — discussion of problem whether the valid type is *P. planicauda rhenanus* N. 1890 [designated Vogdes 1925] or *P. planicauda planicauda* (Barrande 1846) [designated Přibyl 1946] p. 544, Richter in Richter & Schmidt.

Phalacroma recorded p. 188, ÖPIK in Banks.

Phalacroma cf. *glandiforme* (Angelin) p. 286, C. J. STUBBLEFIELD in Benson.

Phalucroma lasherensis Rusc. text-fig. 24, Rusconi (2).

Phalacroma nuda (Beyr.) p. 88, P. sp. p. 87, Chernysheva (2).

Pharostoma mendozana Rusc. pl. ix fig. 14, Rusconi (2).

Pharostoma cf. *pediloba* (Roemer) p. 380, Jaanusson (6).

Pharostoma pulchrum pulchrum (Barrande) lectotype chosen p. 504, *P. pulchrum vokovicense* subsp. n. p. 505 (530) pl. v fig. 1, pl. vi fig. 1, pl. ii fig. 11 Ordovician (Middle) Bohemia, Šnajdr Sborn. úst. Úst. geol. 22 [Pal.] 1956.

Phillipsella Ocklert [recte Oehlert] — support for suppression in favour of *Phillipsinella* Novák 1886, Stubblefield (1).

Phillipsia or related genus p. 55, Nolan et al.

Phillipsia aff. *carringtonensis* Woodw., *P. cf. laticaudata* W. p. 128, P. sp. pp. 127, 138, Yavorsky.

Phillipsia coronata sp. n. p. 252 pl. i fig. 13 text-fig. 3, *P. carringtonensis* Etheridge p. 253 pl. i figs. 7-10 text-fig. 4, *P. mugodjarica* sp. n. p. 255 pl. i figs. 1-4 text-figs. 5-6, *P. bitumulata* Weber p. 257 pl. i figs. 5-6, *P. cf. cassini* W. p. 258 pl. i figs. 14-15 Carboniferous (Lower) U.S.S.R. (Mugodzhar), Balashova Annu. Soc. paléont. russe 15 1956.

Phillipsia eichwaldi p. 21, Froomaget.

Phillipsia labrosa Weber p. 160 pl. xli fig. 19, *P. kazakensis* W. p. 161 pl. xli fig. 20, *P. k.* var. *aryssica* W. pl. xli figs. 18a-b, *P. meisteri* W. pl. xlvi figs. 5a-b, *P. kirgisica* W. pl. xlvi figs. 6-9, *P. cassini* W. p. 162 pl. xlvi figs. 10-12, *P. truncatula* var. *pustulata* Koninck pl. xlvi figs. 13-14, *P. derbyensis* var. *kiritchenkoi* W. pl. xlvi figs. 15-16, *P. eichwaldi* var. *mucronata* McCoy p. 163 pl. xlvi figs. 17-18, Weber (1).

Phillipsia sp. p. 34, Chow.

Phillipsidae see *Phillipsiidae*.

Phillipsiidae [emended from *Philipsidae*] Oehlert 1886 placed on Official List of Family-Group Names p. 433, Direction 41.

Phillipsinella Novák 1886—support for validation by suppression of *Phillipsella* Ocklert [recte Oehlert], Stubblefield (1).

Phillipsinella parabola (Barrande) p. 391, Harper.

Phillipsinella parabola (Barr.) p. 258 pl. iv figs. 1–2, Kielan.

Pheidagnostus bituberculatus (Ang.) p. 87, Chernysheva (2).

Pheidagnostus bituberculatus (Angelini) p. 7, Ivshin.

Pheidagnostus sp. p. 158, Thomas & Singleton.

Pheidagnostus sp. p. 36, O. P. SINGLETON in Harris & Thomas.

Pheidagnostus sp. p. 286, O. P. SINGLETON in Benson.

Phylacops recorded p. 6, P'an.

Pichyklen gen. n. [no family assigned], *P. minutissima* sp. n. p. 6 fig. 5 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1–2 1956.

Pichyklen minutissima Rusc. pl. xii fig. 5, Rusconi (2).

Placoparia grandis Hawle & Corda lectotype chosen p. 509 pl. v figs. 2–3, *P. aff. zippei* (Boeck) p. 510 pl. ii figs. 7–8, Šnajdr.

Plaeasiacoma rara Hawle & Corda p. 507, Šnajdr.

Planilimbata-group see *Megistaspis*.

Planiscutellum subgen. n. see *Scutellum*.

Platycalyptene duplicata rare alkali elements content table 1, McKerrow et al. (2).

Platycolpus crucensis Rusc. pl. iii figs. 4–5, Rusconi (2).

Platycolpus eatoni p. 496, Frederickson.

Platycolpus sp. p. 179, Nelson.

Platycolpus sp. p. 22, PALMER in Nolan et al.

Platylichas laxatus (M'Coy) p. 389, P. sp. p. 391, Harper.

Platypeltoides Přibyl 1948 referred to Asaphidae, *P. serus* sp. n. including *Niobe laeviceps* of Moberg & Segerberg 1906 partim (pl. 6 fig. 17) p. 219 pl. iii fig. 23, pl. iv figs. 1–2 text-fig. 35 B Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Plesiomegalaspis Thoral 1946 discussed and considered either a subgenus of or a synonym of *Kayseraspis* Harrington 1938 [quod vide] p. 63, *Paramegalaspis frequens* T. referred p. 64, Jaanusson (5).

Plesiomegalaspis Thoral 1946 discussed p. 234, *P. (P.) planilimbata* (Angelini) for *Megalaspis* p. A. 1851 type lost p. 235 pl. vi figs. 1–9 text-fig. 38A, *P. (P.) estonica* sp. n. including *M. p.* of Schmidt 1906 p. 238 pl. vi figs. 10–15 text-fig. 39A, *P. (P.)* sp. aff. *estonica* p. 239, *P. (P.) norvegica* sp. n. for *M. p.* of Skjeseth 1952 partim (pl. 1 fig. 10) refigured p. 240 pl. vii figs. 1–3 Norway, *P. (P.) scutata* sp. n. p. 241 pl. vii figs. 4–6; *P. (Ekeraspis)* subgen. n. for type *P. (E.) armata* sp. n. p. 242 pl. vii figs. 7–13 text-figs. 38B, 39B, *P. (E.) heroidea* (Brögger) for *M. h. B.* 1882 p. 244 pl. viii figs. 1–4; *P. ?* spp. nos. 1 and 2 p. 246 pl. viii figs. 5, 6, *P. ?* sp. no. 3 p. 246 Ordovician (Lower) Sweden & Norway, Tjernvik Bull. geol. Instn Univ. Upsala 36 2–3 1956.

Plethagnostus Clark 1923 a synonym of *Pseudagnostus* p. 12, Ivshin.

Plethagnostus jarillensis Rusc. pl. iii fig. 6, Rusconi (2).

Plethometopus sp. p. 22, PALMER in Nolan et al.

Plethometopus ? sp. p. 35, J. L. WILSON in Bridge.

Plethopeltella Kobayashi 1943 referred to Iranaspidae subfam. n. p. 448, Lochman (1).

Plethopeltis saratogensis (Walcott) p. 34, Bridge.

Plethopeltis saurini sp. n. Cambrian (Upper) Yun-nan/Ton-kin p. 281 pl. xl figs. 5–7, Kobayashi Trans. palaeont. Soc. Japan NS No. 24 1956.

Plicatolina kindlei Shaw obsolescence of glabellar furrows tabulated p. 1221 table 7, Shaw (4).

Pliomeria martelli Reed 1917 type of *Pliomerina* gen. n. to which *Pliomeria* of Weber 1948 partim also referred p. 1338, Chugaeva.

Pliomerid recorded p. 53, Öpik (3).

Pliomeridae see *Pliomerina* gen. n.

Pliomerina gen. n. [Pliomeridae] p. 1338 for type *Pliomeria martelli* Reed 1917, *Pliomeria* [cf. *pseudoarticulata*] of Weber 1948 and *P. Encrinurella?* *canthifrons* W. 1948 referred to *Pliomerina*, *P. dulanensis* sp. nondescr. text-fig. 3 U.S.S.R. (Kazakhstan) Ordovician (Lower). Chugaeva C.R. Acad. Sci. U.R.S.S. NS 111 6 1956.

Pliomerops actinurus (Dalman), *P.* sp. (undescr.) p. 266, Tjernvik.

Pliomerops nevadensis Walcott, *P. cf. barrandei* (Billings), *P.* sp. p. 29, Nolan et al.

Pliomerops sp. p. 153, Neuman.

Poliellina lermontovi Polet., *P.* sp. p. 271, Repina.

Polielline [sic] *lermontovae* Polet. p. 135, Repina et al.

Porabolinella [sic] *mediasiatica* sp. nov. [nom. nud.] p. 8, Ivshin.

Pradesia Thoral 1935 reference to Isocolididae discussed p. 1198, Whittington (5).

Primaspis R. & E. Richter 1917 discussed p. 198, *P. primordialis* (Barrande) text-figs. 5A-D, *P. keyserlingi* (B.) discussed, *P. crosotus* (Locke) so referred p. 199, *P. ascitus* sp. n. Ordovician (Middle) U.S.A. (Va) p. 199 pl. i figs. 1-21, pl. ii figs. 1-23 text-figs. 2A, 6A-B, Whittington Bull. Mus. comp. Zool. Harv. 114 5 1956.

Primaspis primordialis (Barrande) p. 499 pl. ii figs. 9-10 text-fig. 5, Šnajdr.

Proasaphiscus sp. p. 271, Repina.

Probolium sp. p. 510, Whittington (3).

Proceratocephala Prantl & Přibyl 1949 referred to Miraspinae p. 247, Whittington (1).

Proceratocephala Prantl & Přibyl 1949—*Drummuckaspis* P. & P. 1949 considered a synonym since its type *Acidaspis discreta* Reed 1935 (refigured) is considered a synonym of *P. terribilis* (R. 1914) lectotype selected and figured p. 515 pl. lix fig. 13, pl. lx figs. 2-3, 5-6, 10; *P. terribilis* (R.) partim (pl. 6 fig. 9) referred to *Miraspis?* sp. p. 515 pl. Ix figs. 7-8, Whittington (3).

Proceratopyge Wallerius 1895 discussed with synonym *Lopnorites* Troedsson 1937 p. 21, list of referred spp. p. 22, *P. asiatica* sp. n. p. 24 pl. viii figs. 17-23 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Proceratopyge recorded p. 22, Öpik (2).

Proceratopyge (*Lopnorites*) *chuhiensis* sp. n. p. 273 (280) pl. i figs. 1-6, *P.* sp. p. 275 (282) pl. i fig. 7 Cambrian (Upper) China (An-hwei), Lu Acta palaeont. sinica 4 3 1956.

Prochuangia granulosa sp. n. p. 369 (376) pl. i fig. 5 Cambrian (Upper) China (Kwei-chow), Lu Acta palaeont. sinica 4 3 1956.

Proerbia sp. p. 270, Repina.

Proerbia sp. p. 135, Repina et al.

Proerbia sp. p. 96, Suvorova (1).

Proetidae see *Charabaia* gen. n.

Proetus Steininger 1831 discussed with synonyms *Aeonia* Burmeister 1843 (objective) and *Gerastos* Goldfuss 1843 (subjective) p. 351, *P.* (*P.*) *bohemicus*-group of Přibyl 1946 merged with *P.* (*P.*) *concinnus*-group p. 352, *P.* (*P.*) *concinnus* (Dalman) p. 353 pl. v figs. 29a-c, 30a-b, *P.* (*P.*) *concinnus osiliensis* Schmidt p. 348 pl. i fig. 1, pl. ii fig. 8, *P.* (*P.*) *cuvieri* Steininger neotype chosen and illustrated with synonyms *G. laevigatus* and *G. granulosus* Goldfuss [quae vide] p. 353 pl. i figs. 2-3, pl. ii figs. 6-7 (sections), pl. iii figs. 13-16, pl. iv figs. 18-22, pl. v figs. 31-33, pl. vi figs. 35-37, text-fig. 1, *P.* (*P.*) *granulosus* (G.) record of Kielan 1954 discussed p. 371, *P.* (*P.*) *margaritaceus* Gürich 1895 a species

dubia p. 372, *P. (P.) prox* sp. n. Devonian (Middle) Germany p. 373 pl. iii figs. 17a-c, pl. iv figs. 23-28, pl. v fig. 34, pl. vi figs. 38a-c, 39a-c, *P. (P.) chamaeleo* p. 372, R. & E. Richter Senck. leth. 37 3-4 1956.

Proetus altepinus Rusc. pl. x fig. 9, *P. pichypuelchensis* R. pl. xi fig. 7, Rusconi (2).

Proetus buchi Corda p. 21 pl. ii fig. 1, *P. subplanatus* Maurer var. *granulata* var. n. [from conglomerates] p. 22 pl. ii figs. 14a-6, *P. peetzi* sp. n. for *P. aff. cuvieri* of Peetz 1901 p. 23 pl. ii figs. 6a-6, *P. lazutkini* sp. n. p. 25 pl. i figs. 13-15, *P. kuznetskiensis* sp. n. p. 26 pl. ii figs. 4, 9 Devonian (Middle) U.S.S.R. (Kuznetsk), *P. ex gr. bohemicus* C. p. 28 pl. i fig. 11, *P. aff. laevigatus* Maurer (*non Goldfuss*) p. 29 pl. ii figs. 7 a-6, *P. sp.* p. 30 pl. ii figs. 10a-6, Chernysheva Upper Silurian and Devonian trilobites from the Kuznetsk Basin 1951.

Proetus indosinensis Mausuy and P. cf. i. p. 452 ff., *P. sp.* p. 458, Yoh.

Proetus latilimbatus Gr. recorded p. 11, P'an.

Proetus pachydermatus p. 1034, Swartz & Whitmore.

Proetus cf. P. peroccidens Hall & Whittle p. 55, Nolan et al.

Proetus pila Weber p. 159 pl. xli figs. 8-9, *P. pila* var. *sargaensis* W. p. 159 pl. xli figs. 10-13 holotypes of both spp. figured, Weber (1).

Proetus sibiricus Tschernyschew 1893 p. 186 pl. xvii fig. 2, *P. boemicus* Corda 1847 p. 186 pl. xvii fig. 3, Weber (2).

Proetus woehrmanni Schmidt 1907 referred to *Agerina* gen. n. [quod vide] p. 198, Tjernvik.

Proetus fragments (recalling *Cornu-proetus*) p. 59, *P. sp.* p. 102, Schmidt.

Proetus n. sp. [undescr.] Carboniferous (Lower) p. 42, GIETY in Hewett.

Proetus sp. p. 391, Harper.

Proetus sp. p. 635 pl. iv fig. 15, Tsin.

Proetus? sp. cf. *P. rowi* (Green) p. 2281, Pierce.

"*Proetus*" sp. p. 1452 ff., Oliver.

"*Proetus*" sp. sp. p. 25, Müller.

Promegalaspides Westergård 1939 discussed p. 252, *P. (Borogothus)* subgen. n. for type *Megalaspis stenorhachis* Angelin 1851 type lost [including in synonymy *M. planilimbata* of Skjeseth 1952 (*non A.*) *partim* (pl. 1 fig. 9) and *Ptychopyge* sp. S.] p. 253 pl. ix figs. 6-14 text-fig. 41A, *P. (B.) intactus* (Moberg & Segerberg) for *M. i.* M. & S. lectotype chosen & figured p. 255 pl. x figs. 1-4, *P. (B.)* sp. p. 257 Ordovician (Lower) Sweden & Norway; *P. (B.) goniopleura* (Thoräl 1935) so referred p. 253, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Proparian trilobite (compared with *Pagetia*, *Dipharus*, *Calodiscus*) p. 111, Daily.

Prosaukia recorded p. 1559, Fisher (1).

Prosaukia tentatively recorded p. 22, Öpik (2).

Prosaukia? recorded p. 45, P. pp. 47, 53, Öpik (3).

Prosaukia angulata (Mausuy) p. 281 pl. xl fig. 12, Kobayashi (2).

Prosaukia? anomala Ulrich & Resser referred to *Mareda* p. 448, Lochman (1).

Prosaukia curvicostata Ulrich & Resser with synonyms after Raasch 1952 p. 97 pl. i figs. 1-12, *P. sp.* cf. *P. curvicostata* p. 98 pl. i fig. 13, *P. sp.* A Cambrian (Upper) U.S.A. (Mich.) p. 98 pl. i figs. 14-15, Stumm.

Prosaukia sp. p. 496, Frederickson.

Prosaukia sp. p. 21, Palmer (1).

Prosaukia (2 spp.) p. 65, Casey & Gilbert-Tomlinson.

Protillaenius Raymond 1937 a synonym of *Maryvillia* Walcott 1916 to which its type *P. marginatus* R. is referred p. 1267, Rasetti (1).

Protolenidae R. & E. Richter 1948 discussed p. 31, see Lermontoviinae subfam. n. and *Protoleninae*, Suvo-rova (1).

Protolenidae — suggested reference of *Chakasskia* Poletayeva p. 449, Lochman (1).

Protoleninae discussed p. 54 and taken to include *Protolenus*, *Matthewlenus*, *Bergeroniellus*, *Bergeroniaspis*, *Olekmaspis* gen. n., *Lusatiospis*, *Coreolenus*, *Hamatolenus*, *Blayacina*, Suvorova (1).

Protolenus Matthew 1892 discussed p. 54, *P. dzevanovskii* Lermontova type of *Lermontovia* gen. n. p. 37 to which *P. grandis* L. also referred p. 45, Suvorova (1).

Protolenus paradoxoides Matthew text-fig. 1 (drawings), Suvorova (2).

Protolenus radegasti Czarnocki probably belongs to *Lusatiospis* p. 139, Samsonowicz.

Protolloydolithus Williams 1948 raised to generic rank and discussed p. 41, *P. ramsayi* (Hicks) syntypes refigured and locality discussed p. 41 pl. v figs. 9–12, *P. neintianus* sp. n. Ordovician (Middle) Britain (Shropshire) p. 42 pl. v figs. 13–15, pl. vi figs. 1–3 [young forms], *P. reticulatus* (Elles) for *Trinucleoides* r. E. 1940 revised description, *Trinucleus primitus* Born may belong to *P.* p. 41, Whittard Palaeontogr. Soc. [Monogr.] 110 1956.

Protopeltura Brögger 1882—proposed to designate as type species *Peltura praecursor* Westergaard 1909 [= *Olenus*? *acanthurus* B. 1882 non Angelin] and to place genus on Official List of Generic Names, Henningsmoen (2).

Protopeltura praecursor (Westergård) listed p. 170, Tjernvik.

"*Protopliomerops*" *primigenius* (Angelini) and "*P.*" *toernquisti* (Holm) listed, should be referred to new genus or genera p. 265, Tjernvik.

Prozacanthoides eatoni (Walcott) listed p. 1355, Lochman (2).

Psalaspis Resser 1937 referred to Parabolinoideidae fam. n. p. 454, Lochman (1).

Psalikilus recorded p. 936, Sando.

Pseudagnostus Jaekel 1909 discussed with synonyms *Plethagnostus* Clark, *Euplethagnostus* Lermontova, *Rhaptagnostus* Whitehouse and *Pseudorhaptagnostus* L. p. 11, list of

referred spp. p. 15, *P. pseudocyclopis* sp. n. p. 17 pl. i figs. 1–8, 10, 16–17, *P. angustilobus* sp. n. p. 19 pl. i figs. 9, 11–15, 18–23 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Pseudagnostus p. 41, Shaw & DeLand.

Pseudagnostus recorded p. 67, Casey & Gilbert-Tomlinson.

Pseudagnostus recorded p. 174, ÖPIK in Banks.

Pseudagnostus recorded p. 22; pygidium of *Aspidagnostus* referred to *P.* p. 21, ÖPIK (2).

Pseudagnostus recorded p. 45 ÖPIK (3).

Pseudagnostus communis (Hall & Whitfield) p. 19, *P. prolongus* (H. & W.), *P. convergens* Palmer, *P. laevis* P. p. 22, PALMER in Nolan et al.

Pseudagnostus vastulus Whitehouse, *P.* sp. p. 158, Thomas & Singleton.

Pseudagnostus sp. p. 21, Palmer (1).

? *Pseudagnostus* sp. p. 275 (282) pl. i fig. 8, Lu (1).

Pseudagnostus sp. (compared with *P. vastulus* Whitehouse and *P. convergens* Palmer) p. 367 (375) pl. i figs. 1–2, Lu (2).

Pseudagnostus sp. undet. pl. cxlvii fig. 7, Wilson.

Pseudagnostus spp. p. 36, SINGLETON in Harris & Thomas.

Pseudatops reticulatus (Walcott) listed p. 1354, Lochman (2).

Pseudobasilicus ingens (Barrande) lectotype chosen p. 489, Šnajdr.

Pseudobasilicus nobilis (Barr.) p. 258 pl. ii fig. 6, Kielan.

Pseudobasilicus sp. cf. *P.* sp. Harper 1952 p. 391, Harper.

Pseudoekeraspis [sic] sp. p. 134, Repina et al.

Pseudeoeteraspis recorded p. 135,
Repina et al.

Pseudeoeteraspis angarensis
Tschern. [not seen] p. 270, Repina.

Pseudolevinia macropyge Rusc. text-
fig. 38, Rusconi (2).

Pseudomera cf. *P. barrandei* (Billings)
p. 2089, Langenheim et al.

Pseudorhaptagnostus Lermontova
1940 [so dated] a synonym of
Pseudagnostus p. 12, Ivshin.

Pseudosaratogia Wilson 1951 re-
ferred to Idiophidae fam. n. p. 459,
Lochman (1).

Pseudosphaerexochus cf. *granulatus*
(Angelini) p. 391, Harper.

Pseudosphaerexochus n. sp. [un-
descr.] p. 373, Jaanusson (6).

Pseudosphaerexochus sp. p. 65,
V. N. WEBER in Yavorsky.

Pseudosphaerexochus [sic] *laticeps*
(Linnarsson) p. 258, Kielan.

Pterocephalia p. 41, Shaw &
DeLand.

Pterocephalia ? recorded p. 10,
A. R. PALMER in McAllister.

Pterocephalia occidens (Walcott),
P. sanctisabae Roemer p. 19, PALMER
in Nolan et al.

Pterocephalia ? sp. p. 21, Palmer
(1).

Pterocephaliidae Kobayashi dis-
cussed and taken to include *Pterocep-
halia*, *Aphelaspis*, *Blandicephalus*,
Camaraspis, *Camaraspoides*, *Dikelo-
cephalites*, *Dytremacephalus*, *Kazelia*,
Labiostria, *Litocephalus*, *Maladio-
della*, *Pterocephalops* p. 458 text-fig.
6; *Camaraspidae* Lochman a syn-
onym, Lochman (1).

Pterocephalina Resser 1938 a syn-
onym of *Litocephalus* R. 1937 [quod
vide], Resser's 1942 spp. *grata*,
notha, *pogonipensis*, *texana* & *uta-
hensis* and *P. cf. P. grata* of Wilson
1954 excluded from *L.* but not re-
assigned p. 608, Palmer (2).

Pterocephalina bilobata (Hall &
Whitfield) p. 19, PALMER in Nolan
et al.

"*Pterocephalina*" cf. *P. grata* of
Wilson 1954 referred with query to
Labiostria platifrons Palmer p. 1346,
Wilson.

Pterocephalops Rasetti 1944 re-
ferred to Pterocephaliidae p. 458,
Lochman (1).

Pterygometopinae — removal
from Phacopidae tentatively sug-
gested p. 426, Temple (1).

Pterygometopus jukesii (Salter) p.
389, Harper.

Pterygometopus laevigata Schm. p.
23, Röömusoks (1).

Pterygometopus nieszkovskii
(Schmidt) p. 59 pl. xxv fig. 4, *P. cf.
panderi* (S.) p. 60 pl. xxv figs. 5a-6, pl.
xxvi figs. 2a-6, Ivanov & Myagkova.

Pterygometopus recurvus (Olin) p.
258 pl. ii figs. 2-4, Kielan.

Ptychagnostus and *P.?* recorded
p. 173, ÖPIK in Banks.

Ptychagnostus atavus (Tullberg) p.
373, Lu (2).

Ptychagnostus atavus p. 63, Casey
& Gilbert-Tomlinson.

Ptychagnostus australiensis (Chap-
man) p. 158, Thomas & Singleton.

Ptychagnostus gibbus, *P. atavus*,
P. punctuosus, *P. aculeatus*—Queens-
land forms discussed p. 16, ÖPIK (2).

Ptychagnostus (*Triplagnostus*) cf.
gibbus, *P. (T.)* spp. p. 43, *P.?* p. 53,
ÖPIK (3).

Ptychagnostus lyra Lerm. p. 86,
P. atavus (Tullb.) p. 89, Chernysheva
(2).

Ptychagnostus nathersti (Brögger)
p. 286, O. P. SINGLETON in Benson.

Ptychagnostus nathersti (Brögger)
[form comparable with], and prob-
ably *P. punctuosus* (Angelini) p. 287,
A. A. ÖPIK in Benson.

Ptychagnostus pichum Rusc. pl. vi
fig. 1, Rusconi (2).

Ptychagnostus (*P.*) *richmondensis*
(Walcott), *P. (Triplagnostus)* sp. p.
12, PALMER in Nolan et al.

Ptychagnostus sp. p. 167, ÖPIK in
Elliston.

Ptychaspidae discussed and taken to include *Eoptychaspis*, *Ptychaspis*, *Euptychaspis*, *Keithia*, *Keithella*, *Anderssonella*, *Stigmaspis*, *Coranocephalus*, *Changia*, *Quadraticephalus* and *Saukioides* p. 450 text-fig. 3, Lochman (1).

Ptychaspis recorded p. 1559, Fisher (1).

Ptychaspis ? recorded p. 53, Öpik (3).

Ptychaspis bicostatus Ruse. pl. vii fig. 2, Rusconi (2).

Ptychaspis walcotti Mansuy referred with query to *Eosaukia* p. 281, Kobayashi (2).

Ptychaspis sp. p. 496, Frederickson.

cf. *Ptychoparella* sp. p. 1393 pl. viii figs. 24-25, Lochman (2).

Ptychoparia anderseni Henningsmoen may be a *Lyriaspis* p. 44, Öpik (3).

Ptychoparia ? *clavata* Walcott [identity considered doubtful] referred to *Bonnaria* gen. n. p. 1386, *P. fitchi* W. [type of *Hamptonella* Resser 1937] referred to *Kochiella* p. 1393; cf. *P. (Liostracus) lata* Cobbold 1913 listed p. 1343, Lochman (2).

Ptychoparia richteri Redlich 1899 — *Chittidilla plana* King 1941 may be identical p. 282, Schindewolf (2).

"*Ptychoparia*" *tchabdensis* sp. n. p. 30 pl. iv figs. 9-11 Cambrian (Middle) U.S.S.R. (Siberia), Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Ptychoparia sp. p. 49, Suvorova (1).

"*Ptychoparia*" sp. (sensu latissimo) p. 32, Öpik in Ivanac.

Ptychoparids (undescribed) p. 17, Öpik (2).

Ptychopariidae — various trails in L. Cambrian of Salt Range ascribed: *Protichnites* spp. A & B, *Rusophycus didymus* (Salter), *Crossochorda* sp. [quae vide], Seilacher.

Ptychoparioidea (unidentified) p. 155, Thomas & Singleton.

? *Ptychopleurites eurekaensis* Kobayashi p. 22, PALMER in Nolan et al.

Ptychopyge Angelin 1854—proposed designation of *Asaphus angustifrons* Dalman 1827 as type species (Brögger's 1886 "selection" of this sp. being considered not definite), and proposed setting aside of all earlier selections including that by Vogdes 1890 of *P. applanata* A. which is considered nomen dubium p. 360, Jaanusson (1).

Ptychopyge sp. Skjeseth 1952 in synonymy of *Promegalaspides (Borogothus) stenorhachis* (Angelin) p. 254; *P. sp.* listed p. 133, Tjernvik.

"*Quadraticephalus*" aff. *teres* Resser & Endo p. 65, Casey & Gilbert-Tomlinson.

Raaschella referred to Solenopleuridae s.l., *R. occidentalis* Lochman p. 51 pl. xii figs. 4-5, Shaw (2).

Raaschella appalachia (Resser) for *Stenochilina* a. R., *R. bristolensis* (R.) for *Terranovella* b. R. p. 20, LOCHMAN in Bridge.

Raaschella occidentalis p. 42, Shaw & DeLand.

Raaschella ornata Lochman p. 21, Palmer (1).

Radiaspis R. & E. Richter 1917 discussed p. 235, Whittington (1).

Radiaspis radiata p. 372, R. & E. Richter (2).

Raphiophoridae see *Bulbaspis* gen. n.

Raphiophorus globifrons (Olin), *R. gratus* (Barr.), *R. tenellus* (B.) p. 258, Kielan.

Raphiophorus ? *ovulum* Weber 1948 referred to *Bulbaspis* gen. n. [quod vide] p. 1336, Chugaeva.

Rasettia cf. *R. capax* (Billings) p. 1348, Wilson.

Rasettia sp. p. 22, PALMER in Nolan et al.

Rawlinsella gen. n. [no family assigned] for type *Acrocephalites* ? *glomeratus* Walcott 1916 horizon and locality discussed, holotype refigured p. 47 pl. ix figs. 7-9 Cambrian (? Middle) U.S.A. (Wyoming), Shaw J. Paleont. 30 1 1956.

Raymondaspis brevicauda sp. n. p. 262 pl. x fig. 18, *R. infundibularis* sp. n. p. 263 pl. x fig. 19, *R. sp. no. 1* p. 263, *R. sp. no. 2* including *Holometopus limbatus* of Wiman 1906 (*non Angelin*) and *R. l.* of Skjeseth 1952 p. 263 Ordovician (Lower) Sweden, *R. cf. l.* (A.) listed p. 148, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Redlichina [sic] *vologdini* Lerm. p. 271, Repina.

Redlichia Cossmann 1902 discussed with synonyms *Neoredlichia* Saito, *Mesodema* Whitehouse, *Redlichops* R. & E. Richter, *Pararedlichia*, *Pareops*, *Latiredlichia*, *Saukiandops*, *Archaeops*, *Kuanyangia* Hupé p. 282ff., *R. noetlingi* (Redlich) with synonyms vars. *lata* and *angusta* R. p. 293 pl. vi figs. 1-15, pl. vii figs. 1-6, text-figs. 1-5, following spp. considered identical or close to *R. noetlingi* — *nobilis* Walcott, *mansi* Resser & Endo, *carinata*, *walcotti* Mansuy, *forresti* Etheridge, *idonea* Whitehouse, *L. saitoi* H., *M. venulosa* W., *Pararedlichia pulchella*, *P. rochi* H. p. 298, following spp. identical or close to each other—*chinensis* W., *verneawai* (Mans.) + *yunnanensis* R. & E., *murakamii*, *manchuriensis* R. & E., *P. subtransversa* H. p. 298, Schindewolf (2).

Redlichia — occurrences in Queensland discussed and referred to Middle Cambrian p. 9, *R. idonea* Whitehouse and *R. chinensis* Walcott p. 17, Öpik (2).

Redlichia recorded p. 41ff., *R.* faunas of N. Australia referred to Middle Cambrian p. 48, Öpik (3).

Redlichia recorded p. 20, H. D. YANG in P'an.

Redlichia recorded p. 39, *R. forresti* (Eth.) p. 40, Traves (1).

Redlichia recorded p. 82, Traves (2).

Redlichia cf. *chinensis* Walcott recorded p. 373, Lu (2).

Redlichia aff. *nobilis* Walcott p. 115, *R. n. sp.* [undescr.] p. 126, Daily.

Redlichia noetlingi (Redl.)—description of trails in L. Cambrian of Salt Range ascribed to this sp.:

Diplichnites sp., *Dimorphichnus obliquus* gen. et sp. n., *Rusophycus bilobatus* [quae vide], Seilacher.

Redlichia 2 sp. p. 31, ÖPIK in Ivanac.

Redlichiidae Poulsen — *Latiredlichidae* Hupé a synonym p. 289, Schindewolf (2).

Redlichina sp. p. 135, Repina et al.

Redlichops R. & E. Richter 1941 a synonym of *Redlichia* p. 282, Schindewolf (2).

Reedops deckeri Delo p. 510, Whittington (3).

Remopleurides cf. *emarginatus* Törnq. p. 379, Jaanusson (6).

Remopleurides aff. *nanus* of Skjeseth 1952 referred with query to *Remopleuridiella* sp. no. 2 p. 204, Tjernvik.

Remopleurides ? *occidens* Phleger p. 2091, Langenheim et al.

Remopleurides sp. p. 389, Harper.

Remopleurides sp. p. 70, V. N. WEBER in Yavorsky.

Remopleuridiella Ross 1951 discussed, *R. sp. no. 1* p. 203 pl. ii figs. 5-6 text-fig. 31, *R. sp. no. 2* including with query *Remopleurides* aff. *nanus* of Skjeseth 1952 p. 204 Ordovician (Lower) Sweden, Tjernvik.

Resseraspis caetensis [spelt *cactensis* in places] sp. n. p. 14 fig. 14 Cambrian (Upper) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Resseraspis cactensis Rusc. pl. xii fig. 14, Rusconi (2).

Rhaptagnostus Whitehouse 1936 a synonym of *Pseudagnostus* p. 12, Ivshin.

Rhinaspis Remelé 1885 a homonym of *Rhinaspis* Perty 1830, *R. erratica* R. 1885 considered nom. nud. and may belong to *Megistaspis* (*M.*) *hyorrhina* (Leuchtenberg) p. 69, Jaanusson (5).

Richardsonella eurekensis Kobayashi, *R. sp.* p. 22, PALMER in Nolan et al.

Richardsonella sp. undet. p. 1347
pl. cxlvii figs. 4-6, Wilson.

Rinconia Hupé 1952 [recte 1953]
referred to Lermontoviinae subfam.
n. p. 37, Suvorova (1).

Rondocephalus mirandus Pokr. MS
[nom. nud.] p. 271, Repina.

Rowia sp. p. 18, PALMER in Nolan
et al.

Saltaspis viator sp. n. p. 201 pl. ii
figs. 1-3 text-fig. 30, *S.* sp. Tjernvik
p. 203 pl. ii fig. 4 Ordovician (Lower)
Sweden, Tjernvik Bull. geol. Instn
Univ. Upsala 36 2-3 1956.

Salterolithus harnagensis Bancroft
p. 386, Harper.

Sao Barrande 1846 proposed validation
(by suppression of *Sao* Billberg 1820) and addition to Official List of Generic Names, *Staurogmus* an objective synonym and *Monadina* Barrande 1846 a contemporaneous subjective synonym of *Sao* [which is formally given precedence over the latter p. 132], Poulsen (2).

Saratogia Walcott 1916 referred to
Idahoidae fam. n. p. 459, Lochman
(1).

Saukia Walcott 1914 discussed,
type *S. lodensis* (Whitfield 1880) with
synonym *S. ornata* Ulrich & Resser
1933, *S. acuta* U. & R. discussed and
considered not the type of *S.* p. 452,
Lochman (1).

Saukia ? recorded p. 65, Casey &
Gilbert-Tomlinson.

Saukia ? recorded p. 53, Öpik (3).

Saukiandops Hupé 1952 [recte
1953] a synonym of *Redlichia* p. 282,
Schindewolf (2).

Saukiella pyrene p. 177 ff., *S.*
pepinensis p. 179, Nelson.

Saukiella sp. p. 22, PALMER in
Nolan et al.

Saukiidae discussed and taken to
include *Saukia*, *Calvinella*, *Lichengia*,
Prosauckia, *Saukiella* and *Tellerina* p.
451 text-fig. 3, Lochman (1).

Saukiinae indeterminable genus
p. 65, Casey & Gilbert-Tomlinson.

Scabriscutellum subgen. n. see
Scutellum.

Schistocephalus sp. p. 271, Repina.

Schivelicus parvius Pokr. MS [nom.
nud.] p. 271, Repina.

Schivelicus parvus Pokr. MS [nom.
nud.] p. 135, Repina et al.

Scotiella apiculata (Salter) p. 387,
Harper.

Scutelluidae discussed p. 100,
phylogeny text-fig. 5, classified into
Scutellum, *Eobronteus* and *Stoermer-*
aspis [quae vide]; *Bronteopsis* ex-
cluded, R. & E. Richter (1).

Scutelluidae see *Dulanaspis* gen. n.

Scutellum Pusch 1833 discussed,
S. (*Scutellum*) with synonym *Dicran-*
actis Corda 1847 [quod vide] p. 101,
S. (*S.*) *costatum* P. with synonym
Bronteus granulatus Goldfuss pl. ii
figs. 7-8 (drawings), *S.* (*S.*) *alutaceum*
(Goldfuss 1843) lectotype selected
and figured p. 95 pl. vi fig. 38, pl. vii
figs. 45-46, *S.* (*S.*) *alutaceum* *geesense*
subsp. n. p. 96 pl. vi fig. 39, pl. vii figs.
43, 44, 44 A Devonian (Middle)
Germany (Eifel), *S.* (*S.*) *flabelli-*
ferum (G. 1839) lectotype figured
with synonym *B. intermedium* G. 1843
(refigured) p. 96 pl. vii figs. 40-42,
42A, text-fig. 2; *S.* (*Kolihapeltis*)
Prantl & Pröbyl 1947 discussed p.
101, *S.* (*K.*) *parabolinum* (Barrande
1882) pl. i fig. 3 (drawing); *S.* (*Paralejurus*)
Corda 1847 with synonym
Holomeris C. 1847 [quod vide]
p. 102, *S.* (*P.*) *campaniferum* (Bey-
rich 1845) text-figs. 3a-e, *S.* (*P.*)
brongniarti (Barrande 1852) with
synonym *Holomeris aulicus* C. 1847
p. 99 text-fig. 4; *S.* (*Planiscutellum*)
subgen. n. p. 102 for type *Bronteus*
planus C. 1847 pl. i fig. 2 (drawing),
pl. iii figs. 16, 17a-b Silurian Bohemia;
S. (*Scabriscutellum*) subgen. n. p. 102
for type *Bronteus scaber* Goldfuss
1843 lectotype selected and figured
with synonym *B. canaliculatus* G.
[lectotype selected] p. 97 pl. i fig. 6
(drawing), pl. ii figs. 9 a-b (draw-
ings), pl. iv fig. 25 (restoration), pl. v
figs. 26-31, pl. vi figs. 34a-b Devonian
(Middle) Germany (Eifel), *S.*
(*Scab.*) *opilio* sp. n. p. 104 pl. vi fig. 35
Devonian (Upper) Germany (Wester-).

wald), *S. (Scab.) insignitum* (Beyrich 1846) lectotype selected and figured p. 105 pl. vi fig. 36, *S. (Scab.) maurum* (R. & E. Richter 1943) pl. vi fig. 37 [these three spp. constituting *opilio*-group], *S. (Scab.) minus* (Roemer 1850) lectotype selected and figured p. 105 pl. v fig. 33, *S. (Scab.) alternans* (R. 1855) lectotype selected and figured p. 106 pl. v fig. 32; *S. (Thysanopeltis)* C. 1847 discussed p. 102, 89ff., *S. (T.) acanthopeltis* (Barrande 1852) holotype refigured with synonym *B. halli* Woodward 1910 (refigured) p. 92 pl. iv figs. 19–23, *S. (T.) laciniatum* (Sandberger) p. 95 pl. iv fig. 24, *S. (T.) speciosum* (C. 1847) pl. ii fig. 10 (reconstruction); *S. (S.) furciferum*-group of P. & P. 1947 referred to *S. (Kolihapeltis)* p. 92, R. & E. Richter Senck. leth. 37 1–2 1956.

Scutellum see *Bronteus*.

Scutellum (*Scutellum*) larval form probably of *S. (S.) alutaceum geesense* R. & E. Richter p. 474 pl. i fig. 2, *S. (Kolihapeltis)* derivation discussed p. 470, *S. (Weberopeltis)* Maksimowa 1957 may be an independent genus p. 470n, *S. (Thysanopeltis)* phylogeny discussed p. 471, *S. (T.) speciosum* (Corda) pygidium p. 468 pl. i fig. 1, R. & E. Richter (3).

Scutellum (*S.*) *alutaceum geesense*, *S. (S.) flabelliferum*, *S. (Scabriscutellum) scabrum*, *S. (Thysanopeltis) acanthopeltis* p. 372, R. & E. Richter (2).

Scutellum (*Thysanopeltis*) cf. *speciosum* Hawle & Corda 1847 p. 73 (80), Strnad (1).

Selenecemidae see *Falanaspis* gen. n.

Selenoharpes excavatus (Linnarsson), *S. spp.* p. 268, Tjernvik.

Selenopeltinae Corda 1847 so considered for *Selenopeltis* alone p. 279, Whittington (1).

Selenopeltis Corda 1847 discussed and referred to *Selenopeltinae*, *S. buchi* (Barrande) text-figs. 2D, 25 A–C, Whittington (1).

Selenopeltis buchi buchi (Barrande) p. 501 pl. v figs. 5–7, Šnajdr.

Selenopeltoides Prantl & Přibyl 1949 discussed p. 248, Whittington (1).

Semicyclocephalus terminalus Ivsh. [not seen] p. 7, Ivshin.

Semisphaerocephalus nominalis Ivsh., *S. grandis* I. [not seen] p. 7, Ivshin.

Semnocephalus Resser 1942 implied synonymy with *Modocia* Walcott 1924 to which its type *Solenopleura ? weedi* W. 1899 is referred as a synonym of *M. centralis* (Whitfield), *S. minor* R. validity unknown p. 141, Shaw (3).

Semnocephalus cf. *S. centralis* (Whitfield) p. 22, Palmer (1).

Serrodiscus speciosus (Ford) p. 1381 pl. v figs. 13–21, Lochman (2).

Shantungia referred to *Dorypygellinae* p. 9, Kobayashi (1).

Shirakiella Kobayashi 1935 possible relations with *Parabolinoididae* fam. n. discussed p. 456, *S. laticonvexa* K. a synonym of *Coosia tokunagai* K., Lochman (1).

Shirakiella ? recorded p. 65, Casey & Gilbert-Tomlinson.

Shirakiella sp. p. 282, Kobayashi (2).

Shumardia pusilla — discussion of Stubblefield's 1926 developmental series p. 477, R. RICHTER in R. & E. Richter (3).

Shumardia cf. *pusilla* (Sars), *S. nericiensis* Wiman, *S. sp.* listed p. 277, Tjernvik.

Sinosaukia recorded p. 65, Casey & Gilbert-Tomlinson.

Skematopyge tietzei R. & E. Richter p. 218 text-fig. 13, Lewowicki.

Sokhretia subgen. n. of *Kloučekia* [quod vide].

Solenoparia recorded p. 173, ÖPIK in Banks.

Solenoparia recorded p. 287, ÖPIK in Benson.

Solenoparia recorded p. 85, Traves (2).

Solenoparia sp. nov. [undescri.] p. 52, Traves (1).

Solenoparia n. sp. [undescri.] p. 156, Thomas & Singleton.

Solenoparia sp. p. 168, ÖPIK in Elliston.

Solenopleura Angelin 1854 discussed p. 34, *S. lenaica* Lermontova p. 35 pl. v fig. 5, *S. djainensis* L. p. 40 pl. v fig. 6, *S. flerovae* L. MS sp. n. p. 42 pl. v figs. 1-4, *S. zverewi* L. p. 45 pl. v figs. 7-9, *S. magna* sp. n. p. 48 pl. v fig. 10, *S. recta* sp. n. p. 50 pl. v fig. 11, *S. bulusensis* L. MS sp. n. p. 52 pl. v figs. 14-15, *S. urjakhensis* sp. n. p. 54 pl. v figs. 12-13, pl. i fig. 9 pars Cambrian (Middle) U.S.S.R. (Siberia), *S.* sp. p. 86, Chernysheva Middle Cambrian trilobites from Eastern Siberia Part I 1953.

Solenopleura (*Asthenopsis*) *levior* p. 19, ÖPIK (2).

Solenopleura nana Ford 1878 type of *Fordaspis* gen. n. [quod vide] p. 1387, *S.?? tumida* Walcott 1887 referred to *F.* p. 1390, *S. nana* of Walcott 1886 [which was chosen by Resser 1937 as "lectotype" of *nana*], 1887, 1891 referred to *Kootenia troyensis* Resser p. 1391, LOCHMAN (2).

Solenopleura suavis Ivsh., *S. superconvexa* I., *S. lata* I. [none seen] p. 7, Ivshin.

Solenopleura subcincta Lermontova 1951 type of *Onchonotellus* gen. n. [quod vide].

Solenopleura? *weedi* Walcott a synonym of *Modocia centralis* (Whitfield) [quod vide] p. 141, SHAW (3).

Solenopleurella kolbina Repina MS [nom. nud.] p. 270, REPINA.

Solenopleurella sp. (Walcott) p. 16, PALMER in Nolan et al.

Solenopleurella sp. p. 96, *S.?* sp. p. 52, Suvorova (1).

Solenopleuridae see *Onchonotellus* gen. n.

Sonoraspis — *Bathyuriscus howelli* var. *lodensis* Clark may be referable, *S. mohavensis* (Resser) for *Glossopleura* m. R. [which was based on part of type material of *B. h.* var. *lodensis* (refigured)] p. 680 pl. i fig. 1 pars, Stoyanow.

Sphaerexochus calvus McCoy p. 376, Jaanusson (6).

Sphaerexochus cf. *calvus* M'Coy p. 65, V. N. WEBER in Yavorsky.

Sphaerexochus? sp. p. 268 pl. x fig. 22, Tjernvik.

Sphaerocoryphe sp. p. 391, Harper.

Sphaerophthalmus major Lake listed p. 115, *S. alatus* (Boeck) p. 131, Tjernvik.

Spinagnostus pedrensis Rusc. text-fig. 23, *S. cerrillensis* R. pl. iv fig. 13, Rusconi (2).

Stapeleyella inconstans sp. nov. [Whittard 1955] pl. v figs. 1-6, *S. murchisoni* (Salter) lectotype and syntype figured pl. v figs. 7-8, Whittard.

Staurocephalus clarifrons Ang. p. 258 pl. iii figs. 3-4, Kielan.

Staurocephalus sp. p. 70, V. N. WEBER in Yavorsky.

Staurogmus Corda 1847 an objective synonym of *Sao* Barrande 1846 [quod vide], and *S. muricatus* C. 1847 of *Sao hirsuta* B. 1846 p. 132, Poulsen (2).

Stenochilina appalachia Resser referred to *Raaschella* p. 20, LOCHMAN in Bridge.

Stenopareia linnarsoni (Holm) p. 376, Jaanusson (6).

Stenopareia panderi (Barrande) lectotype chosen with synonyms *Illaenus laticeps* and *I. attenuatus* Hawle & Corda [to which it is preferred on grounds of long usage] p. 496 pl. i fig. 4 text-figs. 3-4, Snajdr.

Stenorhachis gen. n. [Asaphidae] p. 54 for type *Isoteloides?* *genaliticurvatus* Hintze 1953 text-figs. 2 A-C Ordovician (Lower) U.S.A. (Utah), Hintze & Jaanusson Bull. geol. Instn Univ. Upsala 36 1 1956.

Stigmacephalus Resser 1936 referred to Parabolinoïdidae fam. n. p. 454, LOCHMAN (1).

Stoermeraspis Prantl & Přibyl 1947 discussed pp. 87, 103, *S. franconica* (Gümbel) discussed p. 88 holotype refigured pl. iv figs. 18 A, a, b, pl. i fig. 4 (drawing), R. & E. Richter (1).

Stoermeraspis Prantl & Přibyl 1947 a subjective synonym of *Octobranteus* Weber 1945 p. 473, R. & E. Richter (3).

Strenuaeva? *groenlandica* (Poulsen) so referred p. 78, C. Poulsen in Troelsen.

Strigigenalis Whittington & Ross 1953 referred to Lecanopygidae p. 448, Lochman (1).

Sulcocephalus see *Tatulaspis* gen. n.

? *Sympysops planus* sp. n. p. 8 fig. 13 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1-2 1956.

Sympysops planus Rusec. pl. xii fig. 13, Rusconi (2).

Sympysurina recorded p. 1560, Flower.

Sympysurina eurekensis (Walcott), *S. spicata* Ulrich, *S. n. sp.* [undescr.] p. 26, *S. sp.* p. 27, Cooper in Nolan et al.

Sympysurina huentotiana Rusec. pl. vii fig. 8, Rusconi (2).

Sympysurina? *oriens* (Moberg & Segerberg) for *Illaenus o.* M. & S. 1906 refigured p. 217 pl. iii figs. 12-18, *S.?* *perseverans* sp. n. p. 218 pl. iii figs. 19-22 Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Sympysurus (*S.*) *angustatus* (Sars & Boeck) with synonym *S. socialis* Linnarsson p. 211 pl. ii figs. 24-25, *S. sp.* p. 212; *S. breviceps* Angelin type of *Varvia* gen. n. p. 212, Tjernvik.

Syspacheilus cf. *S. dunoiensis* (Miller), *S. cf. S. occidens* Lochman p. 22, Palmer (1).

Taenicephalus Ulrich & Resser 1924 referred to Parabolinoidea fam. n. p. 454, Lochman (1).

Taenicephalus cordillerensis Miller with synonyms *T. holmesi*, *T. speciosus*, *T. wyomingensis* Resser spp. p. 559 pl. Ixvii figs. 3-4, DeLand & Shaw.

Taenicephalus cordillerensis p. 42, Shaw & DeLand.

"*Taenicephalus*" *megalops* Kobayashi [excluding K. 1938 pl. 16 fig. 35 as probably an Olenid pl. cxlvii fig. 17] excluded from *Taenicephalus* p. 1346 pl. cxlvii fig. 16, "*T.*" *longifrons* K. considered an Olenid p. 1346 pl. cxlvii figs. 18, 19, 20 pars, Wilson.

Talbotina p. 42, Shaw & DeLand.

Tasmanocephalus Kobayashi 1936 discussed and referred tentatively to Kaolishaniinae p. 16, *T. stephensi* (Etheridge) p. 17 pl. ii figs. 2a-b (drawings), Kobayashi (1).

Tatonaspis sp. p. 22, PALMER in Nolan et al.

Tatulaspis gen. n. (replacement name for *Tollaspellus* Ivshin 1953 nom. nud.) [Familia incerta, compared with *Sulcocephalus*] p. 72 for type *T. princeps* sp. n. p. 73 pl. ix figs. 1-4 Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Teinistion referred to Dorypygellinae p. 9, Kobayashi (1).

Teinistion typicalis of Kobayashi 1931 (non Monke) partim pl. 20 fig. 17 referred to synonymy of *Drepanura ketteleri* M. var. p. 280, Kobayashi (2).

Telaeomarrolithus Williams 1948 considered a full genus pp. 49, 65, *T. radiatus* (Murchison) syntype figured and type locality discussed p. 65 pl. ix figs. 4-5, *T. sp.* indet. p. 66 pl. ix fig. 6, Whittard.

Telephus recorded p. 6, P'an.

Tellerina? recorded p. 53, Öpik (3).

Tellerina (trilobite resembling) p. 67, Casey & Gilbert-Tomlinson.

Tellerina leucosia p. 177ff., *T. crassimarginata* p. 179, Nelson.

Tellerina marica (Walcott) p. 22, PALMER in Nolan et al.

Terranovella typicalis Resser listed; *T. bristolensis* R. referred to *Raaschella* p. 20, LOCHMAN in Bridge.

Thielaspis gen. nov. [nom. nud.] *thielei* (Chapman), *T. minima* (C.) p. 36, SINGLETON in Harris & Thomas,

Thielaspis (n. gen.) [nom. nud.]
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 p. 158, SINGLETON in Thomas &
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Thysanopeltis see *Scutellum*.

Thysanopeltis queuispinosa Okubo
 MS [nom. nud.], *T. halli* p. 347,
 Okubo (1).

Thysanopyge Kayser 1898 referred
 to *Megistaspis*-group p. 65, Jaanusson
 (5).

Tingocephalus — *Parakoldinioidia*
concavolimbata Endo probably refe-
 rable p. 13, Kobayashi (1).

Toernquistia discussed, possible
 affinities with *Hystricurids* p. 41,
 Jaanusson (4).

Toernquistiidae Hupé 1953 placed
 on Official List of Family-Group
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Tolanaspis almaematri Ivsh., *T.*
angustifrons I. [not seen] p. 7,
 Ivshin.

Tollaspellus Ivshin 1953 nom. nud.
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Tomagnostus canotensis Rusc. text-
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Tomagnostus fissus (Lundgr.) p. 86,
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Tonkinella p. 41, Shaw & DeLand.

Tonkinella sp. p. 271, Repina.

Tonkinella sp. p. 135, Repina et al.

Tostonia Walcott 1924 referred to
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Tostonia iole (Walcott) p. 22,
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Trachycheilus see *Ithyektyphus* gen.
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Tretaspis Murchison 1839 suppression
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 Whittington.

Tretaspis McCoy 1849 proposed
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 Murchison 1839) and addition to
 Official List of Generic Names p. 53,
 Stubblefield & Whittington.

Tretaspis granulata (Wahlenburg)
 p. 390 ff., Harper.

Tretaspis granulata bucklandi
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Tretaspis seticornis (His.) p. 379,
 Jaanusson (6).

Triarthropsis pampanum Rusc. pl.
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Triarthrus angelini Linnarsson
 listed p. 277, *T.* sp. p. 201, Tjernvik.

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Tricrepicephalus magnispinus (Wal-
 cott), *T. thoosa* (W.), *T. walcotti*
 Lochman, *T. comus* (W.) p. 20,
 LOCHMAN in Bridge.

Tricrepicephalus cf. *T. texanus*
 (Shumard), *T.* cf. *T. coria* (Walcott),
T. sp. p. 22, Palmer (1).

Trigonocerca Ross 1951 may be
 referred to either *Megistaspis*-group
 or *Isotelus*-group p. 66, Jaanusson (5).

Trigonocerca? recorded p. 936,
 Sando.

Trigonocerca [sp. undet.] of Wilson
 1954 see *Asaphellus* [sp. undet.].

Trilobites cornigerus Schlotheim
 1820 considered nomen dubium and
 suppression urged [see also *Asaphus*],
 Jaanusson (3).

Trilobus punctatus Brünnich 1781
 probably a synonym of *Asaphus haus-
 manni* Brongniart 1822, suppression
 urged in favour of *Entomostracites*
punctatus Wahlenberg 1821 [quod
 vide] and in order to protect *Encrinurus*
 Esmrich 1844 and *Odontochile*
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Trimerococephalus see *Phacops*.

Trimerococephalus ocellatus Perna
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 Weber (2).

Trinodus agnostiformis McCoy p.
 391, Harper.

Trinodus moberti sp. n. for *Agnostus*
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 28A, *T. elliptifrons* sp. n. for *A.*
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Trinodus tardus (Hawle & Corda) p. 258 pl. i figs. 4–6, *Kielan*.

Trinodus sp. p. 155, *Neuman*.

Trinucleid rare alkali elements content table 1, McKerrow et al. (2).

Trinucleidae Emmrich 1844 so ascribed p. 52, Stubblefield & Whittington.

Trinucleidae see *Costonia* and *Bettonia* gen. n.

Trinucleoides reticulatus Elles 1940 referred to *Protolloydolithus* p. 41, Whittard.

Trinucleus Link 1807 suppression urged, *T. tuberculatus* L. 1807 considered unidentifiable and suppression urged p. 52, Stubblefield & Whittington.

Trinucleus Murchison 1839 proposed validation (by suppression of *T. Link 1807*) and addition to Official List of Generic Names p. 53, *Edgellia* Shaw 1950 an objective synonym; type of *Trinucleus* (selected by Vogdes 1890) taken to be *T. fimbriatus* M. 1839 lectotype selected p. 51, Stubblefield & Whittington.

Trinucleus Murchison 1839 discussed, type taken to be *T. fimbriatus* M. (designated by Vogdes 1890) lectotype figured p. 45 pl. vi fig. 4, *T. acutofinalis* sp. n. Ordovician (Middle) Britain (Shropshire) p. 46 pl. vi figs. 5–11; *Edgellia* Shaw 1950 [quod vide] a synonym of *T. p. 45*; *T. primitivus* Born may belong to *Protolloydolithus* p. 41, *T. chamberlaini* and *T. (Cryptolithus) gibbosus* Elles restr. referred to *Bettonia* gen. n. [quod vide] p. 67, *T. (C.) gibbosus* E. partim to *Cryptolithus* sp. p. 68 pl. ix fig. 16, *T. gibbifrons* McCoy 1849 considered nomen dubium and Reed's 1914 selection of neotypes not accepted p. 68, Whittard Palaeontogr. Soc. [Monogr.] 110 1956.

Trinucleus bueyensis sp. n. p. 10 fig. 2 Ordovician (Lower) Argentina (Mendoza), Rusconi Rev. Mus. Hist. nat. Mendoza 9 1–2 1956.

Trinucleus bueyensis Rusc. pl. xii fig. 2, Rusconi (2).

Trinucleus fimbriatus rare alkali elements content table 1, McKerrow et al. (2).

Trinucleus cf. *ornatus* p. 21, Fromaget.

Triplagnostus see *Ptychagnostus*.

Triplagnostus recorded p. 173, ÖPIK in Banks.

Triplagnostus australiensis (Chapman) p. 36, SINGLETON in Harris & Thomas.

Triplagnostus burgessensis Rasetti and *T. praecurrentis* Westergaard may be synonyms p. 44, ÖPIK (3).

Triplagnostus gibbus var. *armata* Lerm. p. 86, *T. extumidus* L. p. 87, Chernysheva (2).

Triplagnostus pedrensis Rusc. text-fig. 21, *T. planus* R. text-fig. 22, Rusconi (2).

Triplagnostus sp. p. 167, ÖPIK in Elliston.

Tropidocoryphe barroisi p. 372, R. & E. Richter (2).

Tropidocoryphe barroisi (Maillieux) pl. i figs. 3–4, R. & E. Richter (3).

Tsinania? recorded p. 65, Casey & Gilbert-Tomlinson.

Tungusella recorded p. 134, Repina et al.

Tungusella manica Repina MS [nom. nud.], *T. obesa* R. MS [nom. nud.] p. 270, Repina.

Typhloproetus aequalis (Meyer 1831) p. 159 pl. xli figs. 14–15, Weber (1).

Typhloproetus? *granulineatus* sp. n. p. 250 pl. i figs. 12 a–6 text-fig. 1 Carboniferous (Lower) U.S.S.R. (Mugodzhar), Balashova Annu. Soc. paléont. russe 15 1956.

Typhloproetus microdiscus grygovensis subsp. n. [may be a geographical race] p. 83 (89) text-fig. Devonian (Middle) Czechoslovakia (Silesia), Strnad Sborn. Sluko [A] 2 (for 1954) 1956.

Typhloproetus schindewolfi R. & E. Richter, *T. subcarintiacus* (Rud. R.), *T. pusillus* (Mstr.) p. 28, Müller.

Typhloproetus subcarintiacus R. Richter p. 217 text-fig. 12, Lewowicki.

Uncaspis micans Resser p. 20, LOCHMAN in Bridge.

Urbanaspis gen. n. [Familia incerta, compared with *Aidarella*] p. 75 for type *U. notabilis* sp. n. p. 76 pl. ix figs. 7, 7a, 8, 8a, 8B Cambrian (Upper) U.S.S.R. (Kazakhstan), Ivshin Upper Cambrian trilobites of Kazakhstan Part I 1956.

Varvia gen. n. [tentatively Asaphidae] p. 212 for type *Sympysurus breviceps* Angelini 1854 lectotype selected and figured p. 213 pl. iii figs. 1-6 text-fig. 34C, *V. falensis* sp. n. including *S. b.* of Moberg & Segerberg 1906 p. 214 pl. iii figs. 7-9 text-fig. 34 B, *V. longicauda* sp. n. p. 215 pl. iii figs. 10-11 text-fig. 34 A Ordovician (Lower) Sweden, Tjernvik Bull. geol. Instn Univ. Upsala 36 2-3 1956.

Viñakainella spinulosa Rusc. transiently preserved appendages recorded p. 35, Rusconi (2).

Volonellus granulatus Ivsh., *V. magnus* I. [not seen] p. 7, Ivshin.

Wanneria walcottana (Wanner) text-fig. 1E, *W. walcottana buelnaensis* Lochman referred to *Fremontia* as *F. b.* p. 58, *W. halli* Walcott type of *Fremontella* gen. n. p. 58, *W. mexicana prima* L. referred to *Laudonia* gen. n. as *L. p.* p. 61, *W. occidens* W. assignment to *Esmeraldina* doubtful p. 61, Harrington.

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Waribole see *Cyrtosymbole*.

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Weymouthia nobilis (Ford) listed p. 1354, Lochman (2).

Whittingtonia Prantl & Přibyl 1949 referred to Miraspinae p. 248, *W. bispinosa* (M'Coy) text-figs. 17A-C, Whittington (1).

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Wilbernia Walcott 1924 referred to Idahoiidae fam. n. p. 459, considered ancestral to Dikelocephalidae p. 449 text-fig. 2, Lochman (1).

Wilbernia sp. p. 22, Palmer (1).

Wuhuia belus (Walcott) may be a late sp. of *Conaspis* p. 450, Lochman (1).

Wutingia Endo 1935 non Melichar 1926 renamed *Endoaspis* nom. n. p. 448, Lochman (1).

Wutingia Endo 1935 discussed and referred to Kaolishaniinae p. 14, *W. rectangulosa* E. lectotype refigured p. 15 pl. ii figs. 1a-b (drawings), 5a-9, Kobayashi (1).

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Xenocheilos cf. *X. spineum* p. 42, Shaw & DeLand.

Xenocheilos sp. p. 22, PALMER in Nolan et al.

Xenostegium belemnura p. 27, Nolan et al.

"*Xenostegium*" *taurus* of Ross 1951 (non Walcott) referred to *Aulacoparia* (A.) gen. n. p. 53, Hintze & Jaanusson.

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and *I. p.?* var. *glabra* K. 1916 p. 490
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Úst. geol. 22 [Pal.] 1956.

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